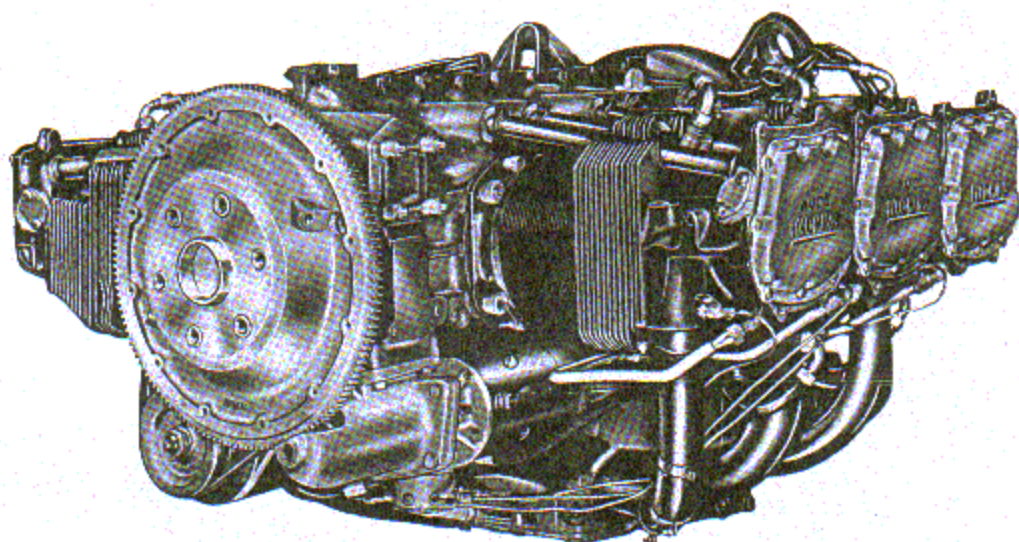


AVCO LYCOMING

PARTS CATALOG



IO-540-SERIES

AIRCRAFT ENGINES

AVCO LYCOMING DIVISION

WILLIAMSPORT, PENNSYLVANIA

PC-215

Price \$12.00

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INTRODUCTION

Through Avco Lycoming's constant effort to up-grade engine parts cataloging, a new engine parts catalog format has been devised. Primarily the system involves dividing Avco Lycoming PC-115 Parts Catalog into three (3) separate catalogs. PC-115, in the future, will cover only O-540 Series aircraft engines. PC-215 will cover the IO-540 Series and PC-315 the TIO-540 Series. This catalog is PC-215 and covers all IO-540 Series aircraft engines.

To eliminate confusion, all three (3) catalogs will be written in the following format. Immediately following the title page, this introduction, listing the major changes, will be inserted. Following the introduction a Table of Contents and a list of Illustrations will be found. Then the actual parts list pages, cataloging and illustrating the major sub-assemblies of Avco Lycoming IO-540 Series aircraft engines.

NOTE

The illustrations, pictures and drawings shown in this publication, are typical of the subject matter they portray; in no instance are they to be interpreted as examples of any specific engines, equipment or part thereof.

Individual parts list pages differ in many ways from previous publications. These pages now list specific engine parts, by quantity per assembly, in column form directly under specific engine models. The only exception to this method will arise when a part is applicable to all models covered in the catalog. In this case no individual listing is made but the quantity per assembly of the part is placed in the far right column of the page, headed by the title "On All".

Each parts list page will be headed by the Avco Lycoming Designation for the aircraft engine series covered in the catalog, i. e. Avco Lycoming IO-540 Series aircraft engines. Under this heading, will be listed the major sub-assembly and under this the parts of that sub-assembly covered on that particular page.

Individual parts list pages will be identified by the Section number at the bottom of page and the page number at the bottom center of the page i.e. page one of Section One will be listed as Page 1-1 etc.

The balance of the catalog does not essentially change from previous publications. It contains a parts listing in numerical order by part number, Vendor Accessory Section, Avco Lycoming Service Repair Kits and Supersedure Section. To use the Vendor Accessory Section properly, it should be noted, that where more than one model of an accessory is employed on the same engine series, the accessory part number will be followed by a letter designation, A, B, C, etc. Individual parts of a specific accessory will also be marked A, B, C, etc. Parts common to all accessories listed will be left blank. For example: four models of Bendix -1200 series magnetos are listed. Thus all parts marked "A" are applicable to model magneto marked "A". All parts marked "B" are applicable to model magneto marked "B" etc. This system is the same as in previous Avco Lycoming Parts Publications.

IO-540 SERIES

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1. The purpose of this
 2. is to provide a
 3. list of the
 4. items which are
 5. included in the
 6. scope of this
 7. project.

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IO-540 SERIES AIRCRAFT ENGINES

PART NO.	OVERSIZE															UNDERSIZE		
	P2	P3	P5	P6	P7	P10	P11	P12	P15	P20	P22	P30	P33	P75	P125	M3	M6	M10
6145						X				X								
6610			X			X												
670			X			X												
6713			X			X				X		X						
6734		X			X			X										
6796						X												
6728		X			X			X										
67556		X				X		X										
68316		X				X		X										
6810		X				X		X										
68260		X				X												
69336		X			X			X										
69679		X			X			X										
6796			X															
68942		X			X			X										
69943		X			X			X										
71451			X			X												
71894			X							X		X						
72057			X			X				X		X						
72058			X			X				X								
72060-S			X			X				X								
72061-S			X			X				X								
72062-S			X			X				X								
72074-S			X							X								
72155-S			X			X				X								
72212			X			X				X		X				X	X	X
72218																		
72897		X	X			X				X		X			X	X		
72810			X			X			X									
74230		X	X			X				X		X						
74241						X												
75089						X				X								
75656-S			X			X				X								
75657-S			X			X				X								
75838		X	X													X	X	X
77044																X	X	
78319																		
79024-S			X			X				X								
LW-10647			X			X										X	X	X
LW-11021																X	X	X
LW-11575																		

NOTE 1

Studs are available in oversize P3, P7, P12. Pistons are available in oversize P10, P20. Piston rings are available in oversize P10, P20.

NOTE 2

When ordering oversize or undersize parts, be sure to specify the required oversize dimension, along with proper part number. For example: to order bushing, P/N 73810 in 0.010 in. oversize, order P/N 73810, P10. To order P/N LW-11621 bearing in 0.006 in. undersize, order P/N LW-11021, M6. Oversize code letter is "P", while undersize code letter is "M".

CRANKCASE ASSEMBLY

CRANKCASE ASSEMBLY

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C4B5	CAC5	DA45	EA5	EB5	GA5	GB5	GC5	GD5	GE5	GF5	GA5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
1	LW-11033	CRANKCASE ASSEMBLY	1		1	1	1	1	1																		
	LW-11035*	CRANKCASE ASSEMBLY			1	1																					
	LW-11036**	CRANKCASE ASSEMBLY								1	1																
	LW-11037	CRANKCASE ASSEMBLY										1	1	1	1	1	1										
	LW-12030+	CRANKCASE ASSEMBLY																					1				
	LW-11964+	CRANKCASE ASSEMBLY*++																1	1	1	1	1		1		1	
	LW-11038\$	CRANKCASE ASSEMBLY									1																
	LW-11221-St	CRANKCASE ASSEMBLY																						1			
2	STD-557	DOWEL, 1/2 in.dia.x 11/16 in.long																								2	
3	66734	STUD, 1/2-13 x 9-7/8 in.long																								4	
4	75302	DOWEL, Crankcase thru stud								4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
5	50-15	STUD, 1/2-13 x 1-7/8 in.long																								12	
6	38-13	STUD, 3/8-16 x 1-5/8 in.long																								24	
7	69679	STUD, 9/16-18 x 10-21/32 in.long																								4	
8	38-15	STUD, 3/8-16 x 1-7/8 in.long	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	
	38-16	STUD, 3/8-16 x 2.00 in.long																					8				
	38-15	STUD, 3/8-16 x 1-7/8 in.long								16																	
	38-17	STUD, 3/8-16 x 2-1/8 in.long																						8			
9	38-22	STUD, 3/8-16 x 2-3/4 in.long																								1	
10	61261	STUD, 5/16-18 x 1-1/2 in.long																								2	
11	67528	STUD, 5/16-18 x 1-5/8 in.long																								1	
12	1102	PLUG, Allen head,1/8 in.pipe																								5	
13	STD-1339	PLUG, Allen head,1/16-27 pipe																								1	
14	65007	RETAINER, Shroud tube seal																								12	
15	69796	DOWEL, Crankshaft bearing																								2	
16	LW-10647	DOWEL, Crankshaft bearing																								6	
17	STD-514	DOWEL, 5/16 dia.x 1/2 in.long																								2	
18	68316*+	STUD, 5/16-18 x 1-11/16 in.long																									
		(Driven height of studs 0.96 - 1.00 in for crankcase service)	4		4	4	4		4		4	4	4					4	4	4			4	4	4	4	
	67556*+	STUD, 5/16-18 x 2.00 in.long (Driven height of studs 1.31 for crankcase service)			4	4				4	4	4	4	4	4	4	4	4	4	4	4	4					
19	73772	NOZZLE ASSEMBLY, Piston cooling								6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	
20	STD-1339*++	PLUG, Allen head,1/16-27 pipe																						6			

* - Provision for Woodward governor.

** - Piston squirts and provision for Woodward governor.

+ - Piston squirts and provision for "AN" governor.

\$ - Piston squirts and provision for "AN" governor. Front mounting pads are machined.

† - Piston squirts and provision for "AN" governor. Long mount studs.

*+ - NOTE: Several models may be manufactured with either stud.

*++ - LW-11964 crankcase is also manufactured with provision for piston squirts. Plugs are furnished in squirt holes. Plugs are not illustrated.

CRANKCASE ASSEMBLY
CRANKCASE ASSEMBLY

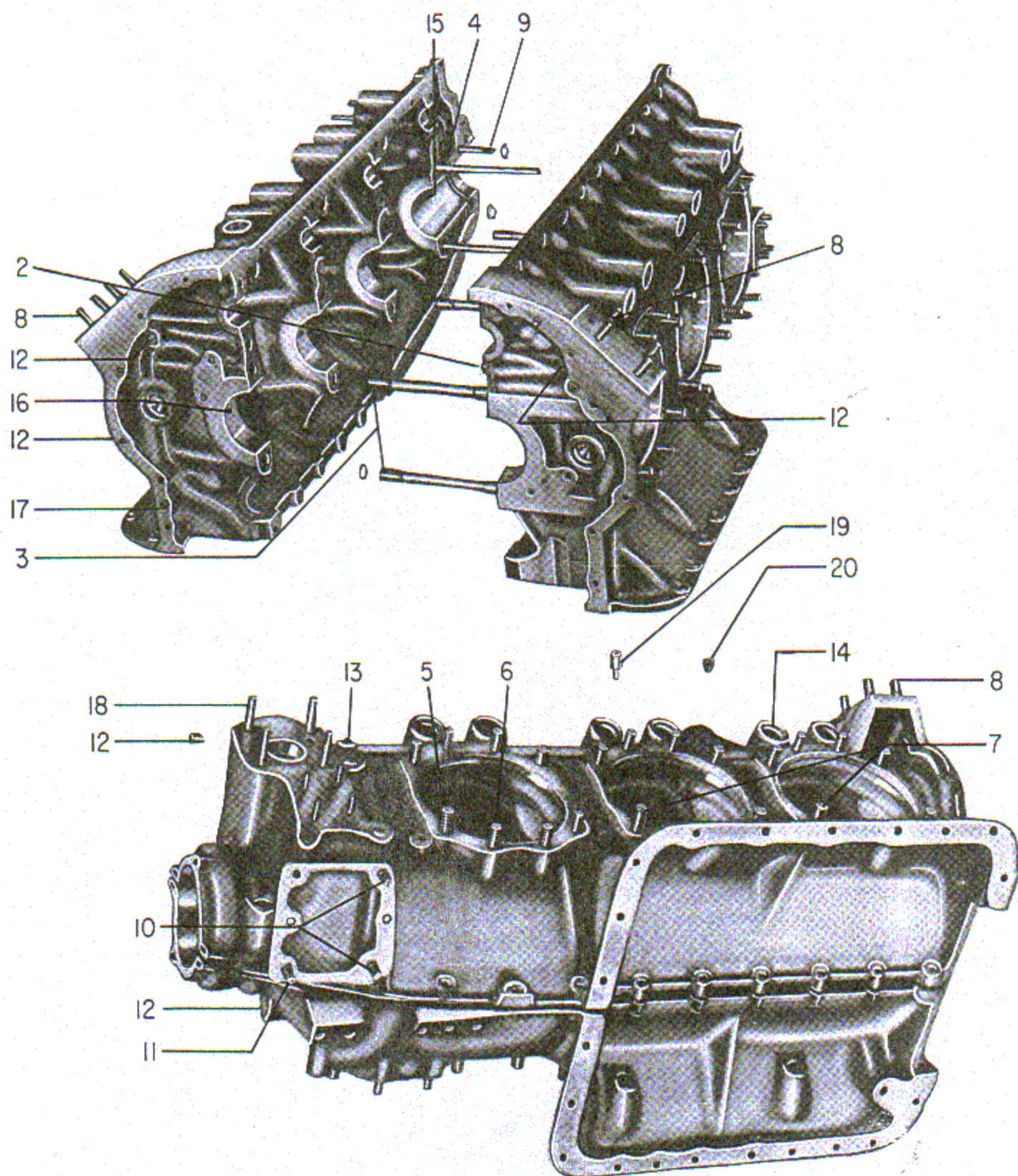


Figure 1
1-2

**CRANKCASE ASSEMBLY
CRANKCASE RELATED PARTS**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL						
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5		K1C5	K1D5	K1E5	M1A5	N1A5	P1A5
1	1028-B	BALL, 0.6875 in.dia.																							1
2	68668	SPRING, Oil pressure relief valve	1	1	1	1	1	1	1												1				
	61804	SPRING, Oil pressure relief valve								1	1	1	1	1	1	1	1	1	1	1		1	1	1	1
3	STD-425	WASHER, Plain,no.10 (max.9 pcs.)	un	un	un	un	un	un	un		un	un	un	un	un	un	un	un	un	un		un	un		
4	STD-1045	GASKET, 1-1/4 ID x 1-1/2 OD x 3/32 annular																							1
5	77808*	VALVE ASSEMBLY, Oil pressure relief, adjustable										1	1				1	1	1		1	1		1	1
6	76162	INSERT, Oil pressure relief valve										1	1				1	1	1		1	1		1	1
7	76161	CAP, Oil pressure relief valve										1	1				1	1	1		1	1		1	1
8	77807	SCREW, Oil pressure adjusting										1	1				1	1	1		1	1		1	1
9	AN-310-6	NUT, Castellated,3/8-24 NF-3										1	1				1	1	1		1	1		1	1
10	MS9048-100	PIN, Spring,1/8 in.dia.x 1/2 in. long										1	1				1	1	1		1	1		1	1
11	76529	PLUG, Oil relief valve	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
12	77807 13792	SEAL, Crankshaft oil	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1				1		1		
	78443	SEAL, Crankshaft oil															1	1	1	1		1	1		1
13	72075	SEAL, Oil,0.090 section x 0.10 in.dia.	8	8	8	8	8	8	8	4	4	4	4	4	4	4	4	4	4	4	8	4	4	4	4
14	72091	RING, Oil seal,23/64 ID x 0.10 in.dia.																							2
15	STD-1197	BOLT, Hex.hd.,3/8-24 x 3-1/2 in.long																							1
16	STD-33	WASHER, Plain,3/8 in.																							3
17	STD-678	WASHER, Internal lock,3/8 in.																							2
18	STD-596	NUT, Plain,3/8-24																							2

* - Adjustable oil pressure relief valve
is standard on above listed models and
optional on remaining models.

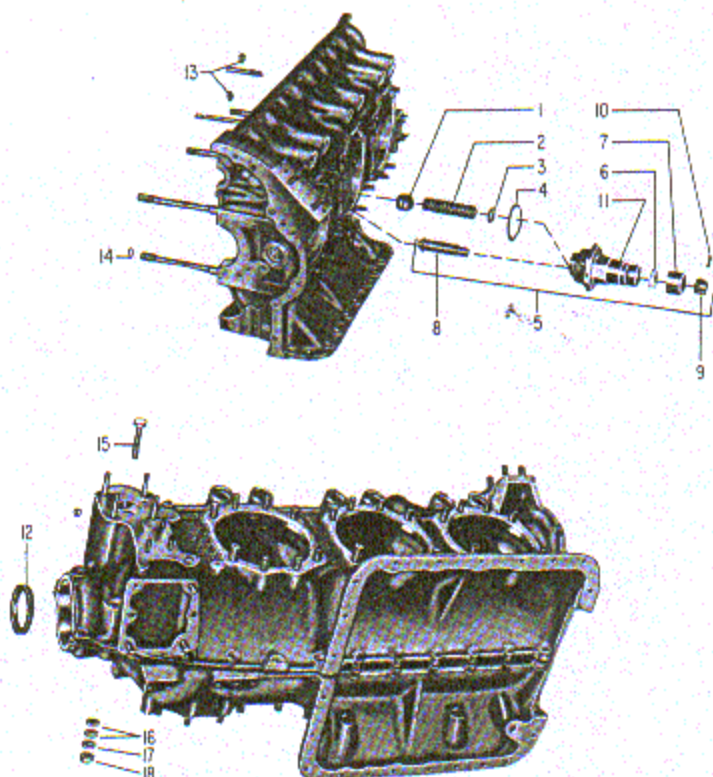


Figure 2

CRANKCASE ASSEMBLY

ENGINE MOUNTING BRACKETS AND OIL LEVEL GAGE ASSEMBLIES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	
1	71047*	BRACKET ASSEMBLY, Engine mounting	4			4			4			4	4	4	4	4	4		4	4	4	4	4		4		4
	71047*	BRACKET ASSEMBLY, Engine mounting	3	3	3						3	3															
	72307*	BRACKET ASSEMBLY, Engine mounting						4	4				4	4				4			4	4					4
	77290**	BRACKET ASSEMBLY, Engine mounting																							3		
	72243*	BRACKET ASSEMBLY, Engine mounting	1	1	1						1	1															
	72292**	BRACKET ASSEMBLY, Engine mounting																						1			
2	66145	DOWEL, 1/4 in.dia.x 1/2 in.long																									8
		MOUNTING BRACKET ATTACHING PARTS																									
3	STD-33	WASHER, Plain,3/8 in.																									16
4	STD-678	WASHER, Internal lock,3/8 in.																									16
5	STD-596	NUT, Plain,3/8-24 x 21/64 in.thick																									16
6	70457	GASKET, Oil filler extension																									1
7	75737	EXTENSION, Short,oil filler	1			1	1	1	1					1			1										
	75761	EXTENSION, Oil filler	1	1	1						1	1	1							1							
	75675	EXTENSION, Short,oil filler	1									1	1	1			1	1		1		1	1				
	74313	EXTENSION, Short,oil filler				1	1		1				1		1				1	1	1	1	1		1	1	1
	77770	EXTENSION, Oil filler													1				1	1							
8	72059	GASKET, Oil level gage	1			1	1	1	1				1			1											
	72220	GASKET, Oil level gage	1	1	1						1	1	1	1	1		1	1		1		1					
	72312	RING, Oil seal,1.00 in.ID x 1/8 in. section					1	1	1				1		1				1	1	1	1	1		1	1	1
9	72043	GAGE ASSEMBLY, Oil level					1	1	1	1																	
	72859	GAGE ASSEMBLY, Oil level	1	1	1						1	1	1		1					1							
	73985+	GAGE ASSEMBLY, Oil level	1									1	1	1	1		1					1					
	74702†	GAGE ASSEMBLY, Oil level				1	1		1										1						1	1	
	74731\$	GAGE ASSEMBLY, Oil level	1										1			1											
	75133&	GAGE ASSEMBLY, Oil level	1											1					1								
	76789†	GAGE ASSEMBLY, Oil level																						1			
	76897*+	GAGE ASSEMBLY, Oil level											1	1					1	1	1	1				1	
	79071*†	GAGE ASSEMBLY, Oil level													1				1	1							
	LW-10975*\$	GAGE ASSEMBLY, Oil level												1		1	1							1			

- * - Dynafocal mounts.
- ** - Used on up-exhaust engine installations, also dynafocal.
- + - Riley Aircraft installations.
- † - Cam action oil level gage with short extension P/N 74313.
- \$ - Doyn Aircraft installations with 1.69 in.extension, P/N 75737.
- & - Dornier-Werke installations with short extension, P/N 75675.
- *+ - Cam action oil level gage with 2.19 in.extension P/N 74313. Tuned sump.
- *† - Cam action oil level gage with 6.31 in.extension, P/N 77770. Tuned sump.
- *\$ - Bellanca Aircraft installations with short extension P/N 75675.

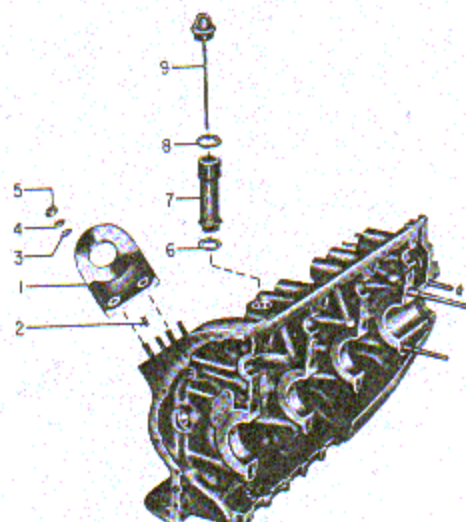


Figure 3
1-4

CRANKCASE ASSEMBLY

CRANKSHAFT, CAMSHAFT AND RELATED PARTS

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL						
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	J1A5	K1A5	K1B5		K1C5	K1D5	K1E5	M1A5	N1A5	P1A5
	75073	CRANKSHAFT AND COUNTERWEIGHT				1																			
	75079	CRANKSHAFT AND COUNTERWEIGHT	1	1	1					1	1	1	1	1	1	1								1	
	75040	CRANKSHAFT AND COUNTERWEIGHT						1	1	1							1								
	76801	CRANKSHAFT AND COUNTERWEIGHT																1	1		1	1			
	77617*	CRANKSHAFT AND COUNTERWEIGHT											1												
	79027**	CRANKSHAFT AND COUNTERWEIGHT												1									1		
	LW-10525+	CRANKSHAFT AND COUNTERWEIGHT																					1	1	
	LW-10844	CRANKSHAFT AND COUNTERWEIGHT																	1						
1	75039	CRANKSHAFT ASSEMBLY					1	1	1	1							1								
	75078	CRANKSHAFT ASSEMBLY		1	1	1					1	1	1	1	1	1	1							1	
	76799	CRANKSHAFT ASSEMBLY																1	1		1	1			
	75075	CRANKSHAFT ASSEMBLY											1												
	79026	CRANKSHAFT ASSEMBLY																				1			
	LW-10621	CRANKSHAFT ASSEMBLY																					1	1	
	LW-10843	CRANKSHAFT ASSEMBLY																	1						
2	STD-1211	PLUG, Extension,2.00 in.dia.																							1
3	73810	BUSHING, Crankshaft dynamic counterweight																							4
4	71640	PLUG, 1-3/8 in.dia.		1	1	1	1	1	1	1	1	1	1	1	1	1	1							1	
	60945	PLUG, 1-1/4 in.dia.																1	1	1	1	1	1	1	1
5	72062	BUSHING, Prop.flange,long		4	4	4	4	4	4	4	4	4	4	4	4	4	4							4	
	75656	BUSHING, Prop.flange,long																4	4	4	4	4	4		
	72062	BUSHING, Prop.flange,long											3												
	75656	BUSHING, Prop.flange,long																					3	3	
6	72061	BUSHING, Prop.flange,short		1	1	1	1	1	1	1	1	1	1	1	1	1	1							1	
	72155	BUSHING, Prop.flange,short																1	1	1	1	1	1		
	72061	BUSHING, Prop.flange,short												2									2	2	
7	72060	BUSHING, Prop.flange,indexing					1	1	1	1							1								
	72074	BUSHING, Prop.flange,indexing		1	1	1					1	1	1	1	1	1	1							1	
	75657	BUSHING, Prop.flange,indexing																1	1		1	1			
	79024	BUSHING, Prop.flange,indexing,long																	1				1	1	1
8	STD-1065	DOWEL, Stepped,.310 to .250 in. dia.x 35/64 in.long																							1
9	71904	COUNTERWEIGHT ASSEMBLY					2																		
	72801	COUNTERWEIGHT ASSEMBLY		2	2	2		2	2	2	2	2	2	2	2	2	2							2	
	73644	COUNTERWEIGHT ASSEMBLY																2	2	2	2	2	2	2	2
10	71903	BUSHING, Dynamic counterweight																							8
11	70416	ROLLER, Dyn.counterweight,6th order					2																		
	72797	ROLLER, Dyn.counterweight,6.3 order		2	2	2		2	2	2	2	2	2	2	2	2	2							2	
	76788	ROLLER, Dyn.counterweight,6.3 order																2	2	2	2	2	2	2	2
12	72022	ROLLER, Dyn.counterweight,5.1 order					2																		
	72965	ROLLER, Dyn.counterweight,5.1 order		2	2	2		2	2	2	2	2	2	2	2	2	2							2	
	76787	ROLLER, Dyn.counterweight,5.1 order																2	2	2	2	2	2	2	2
13	71906	RING, Internal retaining																							8
14	71907	WASHER, Dynamic counterweight																							8
15	67514	GEAR, Crankshaft		1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
	76786	GEAR, Crankshaft																1						1	
16	67516	LOCKPLATE, Crankshaft gear																							1
17	STD-1937	SCREW, Hex.hd.,1/4-20 x 1-3/4 in.long																							1
18	76148	CAMSHAFT ASSEMBLY																							1

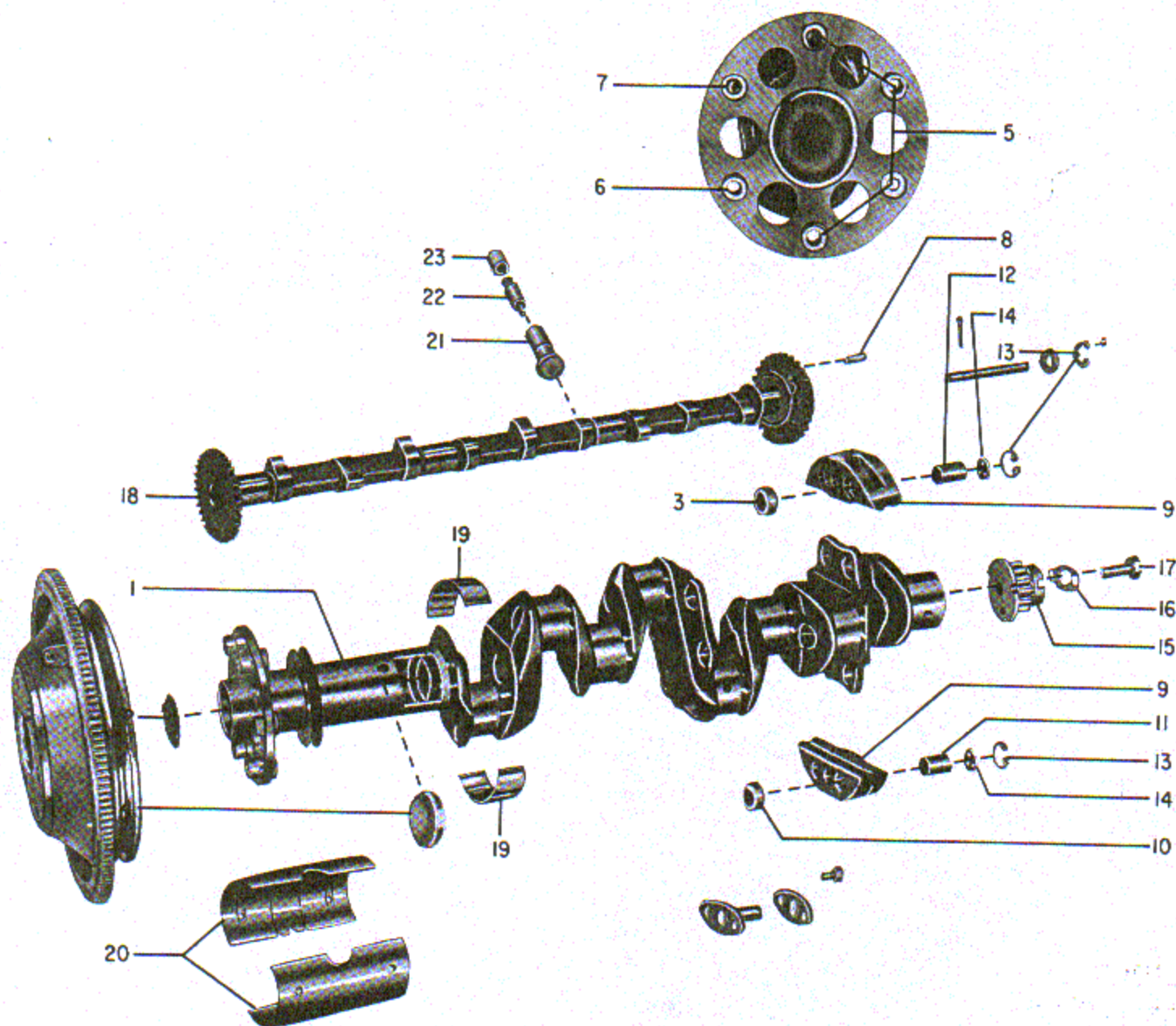
* - Special IMCO installation.

** - Propeller flange bushings for three bladed propeller.

+ - Short propeller flange bushing on center line of no. 1 cylinder.

CRANKCASE ASSEMBLY
CRANKSHAFT, CAMSHAFT AND RELATED PARTS

CRANKSHAFT, CAMSHAFT AND RELATED PARTS																													
FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL		
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5		R1A5	
19	LW-11021	BEARING, Crankshaft	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6									6		
	LW-11575	BEARING, Crankshaft																										6	
20	77044	BEARING, Crankshaft, front	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2		6	6	6	6	6	6	6		6	
	78319	BEARING, Crankshaft, front																									2		
21	72877	BODY, Hydraulic tappet																		2	2	2	2	2	2	2		2	
22	78290	PLUNGER ASSEMBLY, Hydraulic tappet																											12
23	65074	SOCKET, Push rod, hydraulic tappet																											12


Figure 4

**CRANKCASE ASSEMBLY
PROPELLER GOVERNOR DRIVE**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL								
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5		K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5
1	70389	GEAR, Propeller governor driven																									1
2	70384	SHAFT, Propeller governor idler gear																									1
3	70388	GEAR, Propeller governor idler																									1
4	STD-737	KEY, Woodruff,3/32 in.x 1/2 in.																									1
5	73249	WASHER, Thrust																									un
	73250	WASHER, Thrust																									un
	73251	WASHER, Thrust																									un
	73252	WASHER, Thrust																									un
6	70455	GASKET, 25/32 ID x 1-1/8 OD x 0.030 to 0.040 in. thick																									1
7	70454	PLUG, Hex.hd.,3/4 in. -16 thd.																									1
8	72053	GASKET, Governor																									1
9	72378	COVER, Governor drive																									1
		ATTACHING PARTS																									
10	STD-35*	WASHER, Plain,5/16 in.	20	20	20	20		20		20	20		20				20	20		20	20		20	20			4
11	STD-475	WASHER, Internal lock,5/16 in.																									4
12	STD-1410	NUT, Plain,5/16-18																									4
	STD-35**	WASHER, Plain,5/16 in.	4	4			4	4		4			4	4	4	4	4		4	4	4	4		4	4	4	4

* - Woodward governor.

** - "AN" governor.

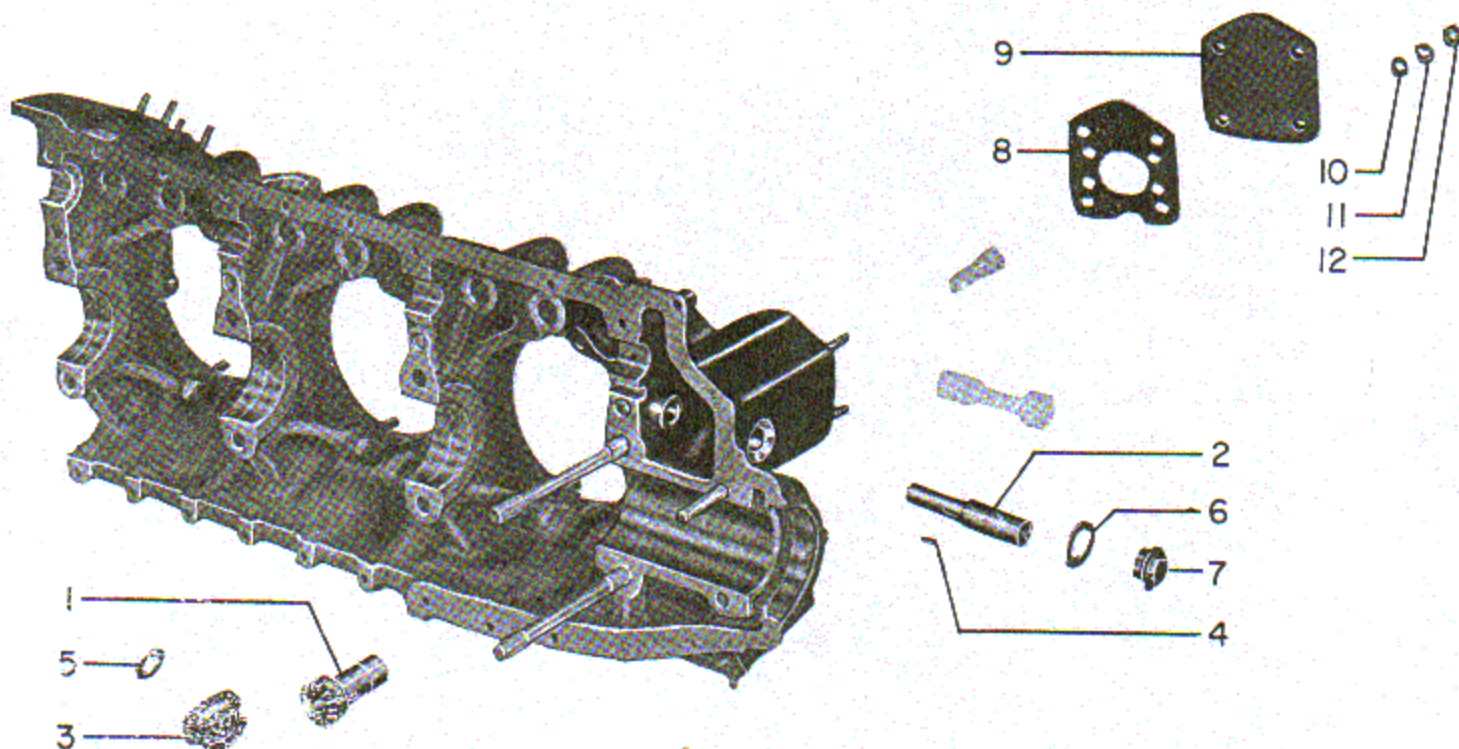


Figure 5
1-7

**CRANKCASE ASSEMBLY
TACHOMETER DRIVE AND STARTER RING GEAR**

TACHOMETER DRIVE AND STARTER RING GEAR																										
FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																				ON ALL			
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5		M1A5	N1A5	P1A5
1	76155	SHAFT ASSEMBLY, Tachometer																								1
2	78368	PIN, 3/16 in.dia.x 2-21/64 in.long																								1
3	76118	SPACER, Tachometer shaft, centering																								1
4	MS16625-1081	RING, Internal retaining																								1
5	LW-10575	SHAFT, Crankshaft idler gear																								2
6	71646	LOCKPLATE, 5/16 in.bolt x 1-3/4 in. spacing																								2
7	STD-1838	SCREW, Hex.hd.,5/16-18 x 15/16 in.long																								4
8	72565*	SUPPORT ASSEMBLY, Starter ring gear				1															1					
	78446**	SUPPORT ASSEMBLY, Starter ring gear	1									1										1				
	75221+	SUPPORT ASSEMBLY, Starter ring gear									1															
	77579\$	SUPPORT ASSEMBLY, Starter ring gear						1	1	1	1	1	1	1	1	1		1	1	1		1				
	72245†	SUPPORT ASSEMBLY, Starter ring gear	1	1	1						1	1							1	1						
	LW-11151*+	SUPPORT ASSEMBLY, Starter ring gear									1															
	74329*\$	SUPPORT ASSEMBLY, Starter ring gear	1									1														
	75030*†	SUPPORT ASSEMBLY, Starter ring gear					1	1		1	1	1	1	1	1	1	1	1	1		1		1	1	1	1
9	72566	GEAR, Starter ring (12/14 pitch)																								1

* - 12/14 pitch, 1.91:1 drive.

** - 12/14 pitch, 3.25:1 drive. Alternator drive with de-icer holes for 3 bladed propeller.

+ - 12/14 pitch, 2.50:1 drive with de-icing provision.

\$ - 12/14 pitch, 3.25:1 drive for alternators. No de-icing provision.

† - 12/14 pitch, 2.50:1 drive.

*+ - 12/14 pitch, Starter ring gear support for 24V - 100 Amp. and 24V - 70 Amp. Dual belt drive. Idler pulley adjustment. 3.25:1 drive. Three point liquid de-icing provision.

*\$ - 12/14 pitch, 2.50:1 drive with de-icer holes for three bladed propeller.

*† - 12/14 pitch, 3.15:1 drive with de-icing provision for alternator.

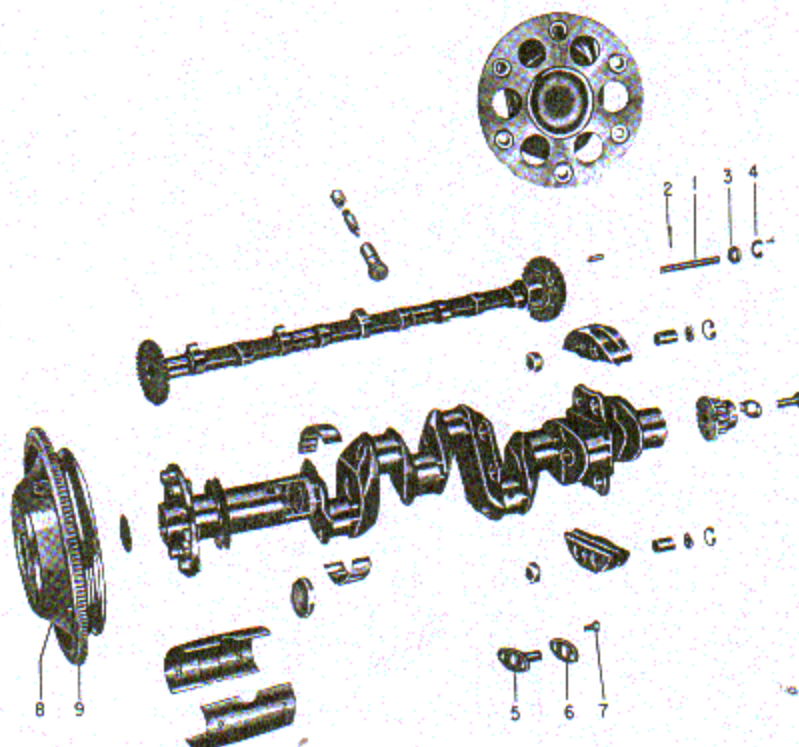


Figure 6

CRANKCASE ASSEMBLY
CRANKCASE ATTACHING PARTS

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																							ON ALL
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	
1	STD-1414	BOLT, Hex.hd.,1/4-20 x 1-1/2 in.long	11	11	11				11									11	11		11	11				
	STD-1414	BOLT, Hex.hd.,1/4-20 x 1-1/2 in.long	7			7	7	7	7	7	7	7	7	7	7	7	7	7	7	7	7	7	7	7	7	7
2	STD-8	WASHER, Plain,1/4 in.	27	27	27				27	27								27	27		27		27			
	STD-8	WASHER, Plain,1/4 in.	25			25	25	25	25		25	25	25	25	25	25	25	25	25	25	25	25	25	25	25	25
3	STD-1646	BOLT, Hex.hd.,1/4-20 x 2.00 in.long (to attach fuel manifold bracket)	2			2	2	2	2		2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
4	STD-2084	BOLT, Hex.hd.,1/4-20 x 1-3/4 in.long	1	1	1				1	1								1	1		1		1			
	STD-2084	BOLT, Hex.hd.,1/4-20 x 1-3/4 in.long	2			2	2	2	2		2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
5	STD-1419	BOLT, Hex.hd.,1/4-20 x 1-1/8 in.long																								4
6	STD-160	WASHER, Internal lock,1/4 in.																								16
7	STD-1411	NUT, Plain,1/4-20																								12
8	STD-1416	BOLT, Hex.hd.,drilled end,1/4-20 x 1-1/2 in.long																								6
9	STD-8	WASHER, Plain,1/4 in.(18 pcs.max.)																								un
10	STD-1409	NUT, Slotted shear,1/4-20																								6
11	STD-1205	BOLT, Hex.hd.,drilled,3/8-24 x 2-3/16 long																								1
12	STD-33	WASHER, Plain,3/8 in.																								2
13	STD-872	NUT, Slotted,3/8-24																								1
14	60803	STRAP, Lifting		1	1				1	1																
	60803	STRAP, Lifting	2			2	2	2	2		2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
15	STD-1931*	BOLT, Hex.hd.,1/4-20 x 1-7/8 in.long	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1

* - (2) STD-8 and (1) STD-1931 as-
semble in rear top hole of crankcase to
prevent bending of lift strap.

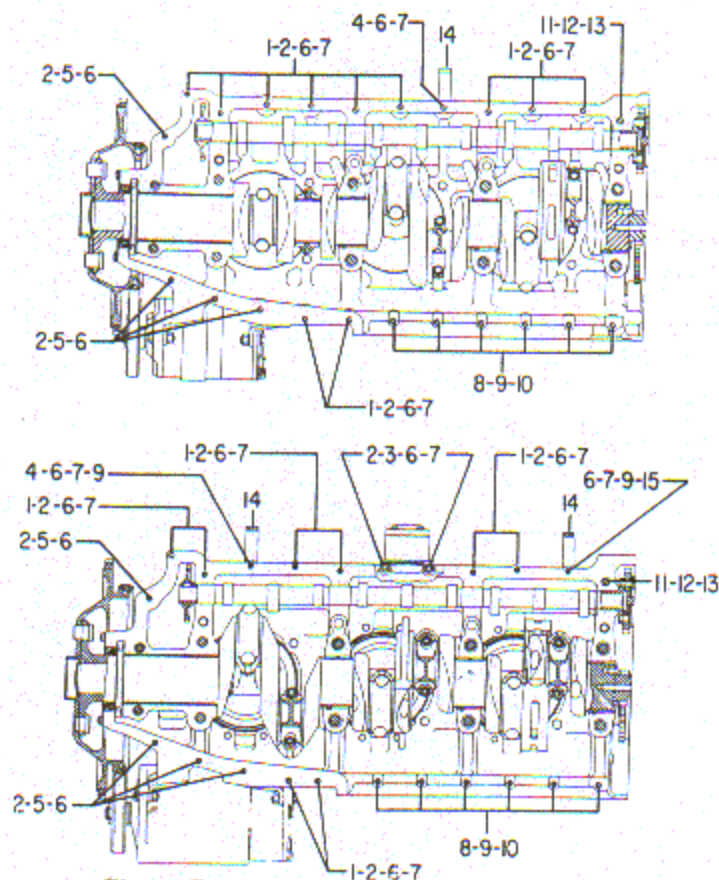


Figure 7

ACCESSORY HOUSING AND ACCESSORY DRIVES

ACCESSORY HOUSING AND OIL PUMP ASSEMBLIES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			ATA5	BTA5	BIC5	CIB5	CAB5	CAC5	DAA5	EIA5	ETB5	GIA5	GIB5	GIC5	GID5	GIE5	GIF5	JAA5	KIA5	KIB5	KIC5	KID5	KIE5	MIA5	NTA5	PIA5	
1	73818	GASKET, Accessory housing																									1
2	76152	HOUSING ASSEMBLY, Accessory					1	1		1																1	
	76153*	HOUSING ASSEMBLY, Accessory	1	1	1			1		1	1	1	1		1	1	1	1			1		1			1	
	78490*	HOUSING ASSEMBLY, Accessory											1	1						1	1	1	1	1	1		
	LW-10641**	HOUSING ASSEMBLY, Accessory																		1						1	
3	61261	STUD, 5/16-18 x 1-1/2 in.long																									4
4	61265	STUD, Drilled,5/16-18 x 2-3/16 long	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3
	31CD-20	STUD, Drilled,5/16-18 x 2-1/2 in. long																			3					3	
5	70470	STUD, 5/16-18 x 2-9/16 in.long																									4
6	25C-21	STUD, 1/4-20 x 2-5/8 in.long																									4
7	31C-19	STUD, 5/16-18 x 2-3/8 in.long																		4						4	
8	STD-784	PLUG, Allen hd.,3/8 in.pipe																									1
9	1102	PLUG, Allen hd.,1/8-27 NPT																									2
10	76156	SHIELD, Oil accessory breather																									1
	78528	BODY ASSEMBLY, Oil pump	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
	75287	BODY ASSEMBLY, Oil pump																			1					1	
11	78527	BODY, Oil pump	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
	75277	BODY, Oil pump																			1					1	
12	STD-1339	PLUG, Allen hd.,1/16-27 NPT																									1
13	60329	SHAFT, Oil pump idler																			1					1	
14	STD-714	PIN, Cotter,1/8 in.dia.x 1.00 in. long																			1					1	
15	78532	IMPELLER ASSEMBLY, Oil pump driven	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
16	78530	SHAFT, Oil pump idler	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
17	77272	IMPELLER, Oil pump driven	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
18	78619	SHAFT, Oil pump drive	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
	76784	SHAFT, Oil pump drive																			1					1	
19	77313	IMPELLER, Oil pump driving	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
	61297	IMPELLER, Oil pump driving																			1					1	
20	61298	IMPELLER, Oil pump driven																			1					1	
21	STD-1973	KEY, Woodruff,1/8 in.x 3/4 in.dia.	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
OIL PUMP ATTACHING PARTS																											
22	STD-35	WASHER, Plain,5/16 in.																									3
23	STD-1420	NUT, Slotted,5/16-18																									3
24	61165	SEAL, Tachometer drive, oil																									1
ACCESSORY HOUSING ATTACHING PARTS																											
25	STD-8	WASHER, Plain,1/4 in.																									10
26	STD-160	WASHER, Internal lock,1/4 in.																									12
27	STD-1204	BOLT, Hex.hd.,1/4-20 x 15/16 in.long																									9
28	STD-1419	BOLT, Hex.hd.,1/4-20 x 1-1/8 in.long																									1
29	STD-1931	BOLT, 1/4-20 x 1-7/8 in.long																									2

* - For use with integral gear camshaft.

** - Studded for large oil pump.

ACCESSORY HOUSING AND ACCESSORY DRIVES

ACCESSORY HOUSING AND OIL PUMP ASSEMBLIES

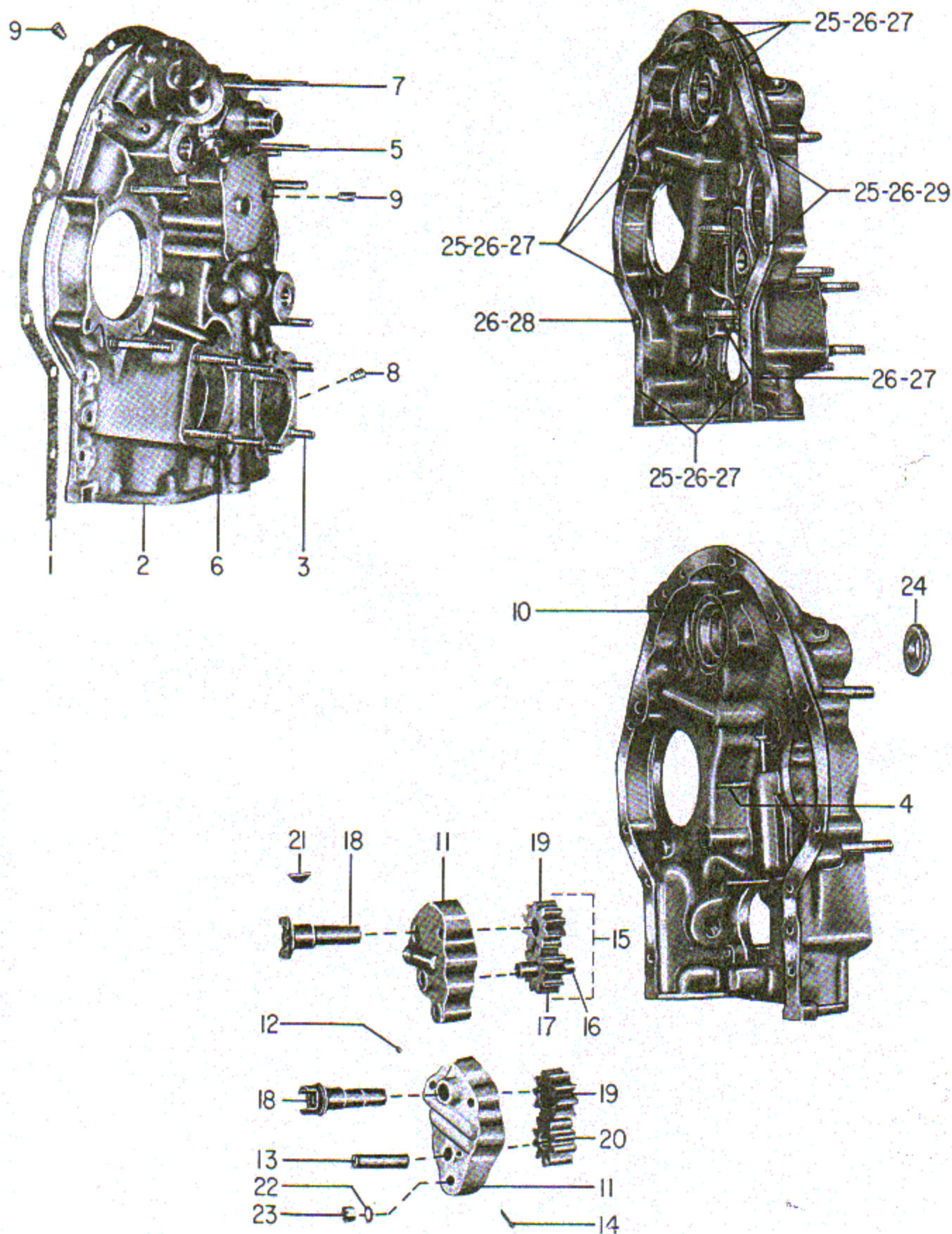


Figure 8

ACCESSORY HOUSING AND ACCESSORY DRIVES
ACCESSORY, FUEL PUMP AND VACUUM PUMP DRIVES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			ATA5	BJA5	BIC5	CIB5	CAB5	CAC5	DAA5	EIA5	EB5	GIA5	GB5	GIC5	GID5	GIE5	JAA5	KIA5	KIB5	KIC5	KID5	KIE5	MIA5	NIA5	PIA5	RIA5	
1	71652	GEAR ASSEMBLY, Crankshaft idler				1	1	1	1																1		
2	67530	BUSHING, Crankshaft idler gear				1	1	1	1																1		
3	71668	GEAR ASSEMBLY, Crankshaft idler, plain				1	1	1	1		1									1					1		
	67530	BUSHING, Crankshaft idler gear				1	1	1	1		1									1					1		
4	61544	PLUNGER, Fuel pump, long				1	1	1	1																1		
	71668	GEAR ASSEMBLY, Crankshaft idler, plain	2	2						2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
	67530	BUSHING, Crankshaft idler gear	2	2						2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
5	76737	GEAR ASSEMBLY, Crankshaft idler, plain									1										1						
	67530	BUSHING, Crankshaft idler gear									1										1						
6	71664	GEAR ASSEMBLY, Fuel pump idler	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
7	77309	BUSHING, Crankshaft idler gear	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
8	72246	SHAFT, Fuel pump idler gear	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
9	70474	WASHER, Fuel pump gear, thrust	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
10	STD-1737	RING, Ext. retaining, .57 dia. x .035 in. thick	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
11	71667	LOCKPLATE, Offset, 1/4 in. bolt x 1-3/4 spacing	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
12	STD-705	SCREW, Hex. hd., 1/4-20 x 11/16 in. long	2	2						2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	
13	72972	SHAFTGEAR ASSEMBLY, Fuel pump drive	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
14	69164	GASKET, Fuel pump adapter	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
15	69159	ADAPTER ASSEMBLY, Fuel pump drive	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
16	STD-1774	PIN, 1/8 in. dia. x 1/4 in. long	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
17	STD-213	SEAL, Oil, 3/4 in. ID x 1-3/8 in. OD	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
18	61183	GASKET, Accessory adapter																								1	
19	60430	COVER, Vacuum pump	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
COVER ATTACHING PARTS																											
20	STD-8	WASHER, Plain, 1/4 in.																								4	
21	STD-160	WASHER, Internal lock, 1/4 in.																								4	
22	STD-1411	NUT, Plain, 1/4-20																								4	
23	68593	SPACER, Vacuum pump stud												1						1		1					
24	67536	ADAPTER ASSEMBLY, Vacuum pump	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
25	STD-1774	DOWEL, 1/8 in. dia. x 1/4 in. long	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
26	STD-208	SEAL, 7/8 ID x 1-1/2 OD x 5/16 in. wide	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
27	72974	GEAR ASSEMBLY, Vacuum pump driven	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
28	71596	WASHER, Accessory driven gear	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
29	AN4045-1	GASKET, Vacuum pump	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
30	79017	SPACER, Vacuum pump pad											1								1					1	
	STD-8	WASHER, Plain, 1/4 in.											12								12					12	

**ACCESSORY HOUSING AND ACCESSORY DRIVES
ACCESSORY, FUEL PUMP AND VACUUM PUMP DRIVES**

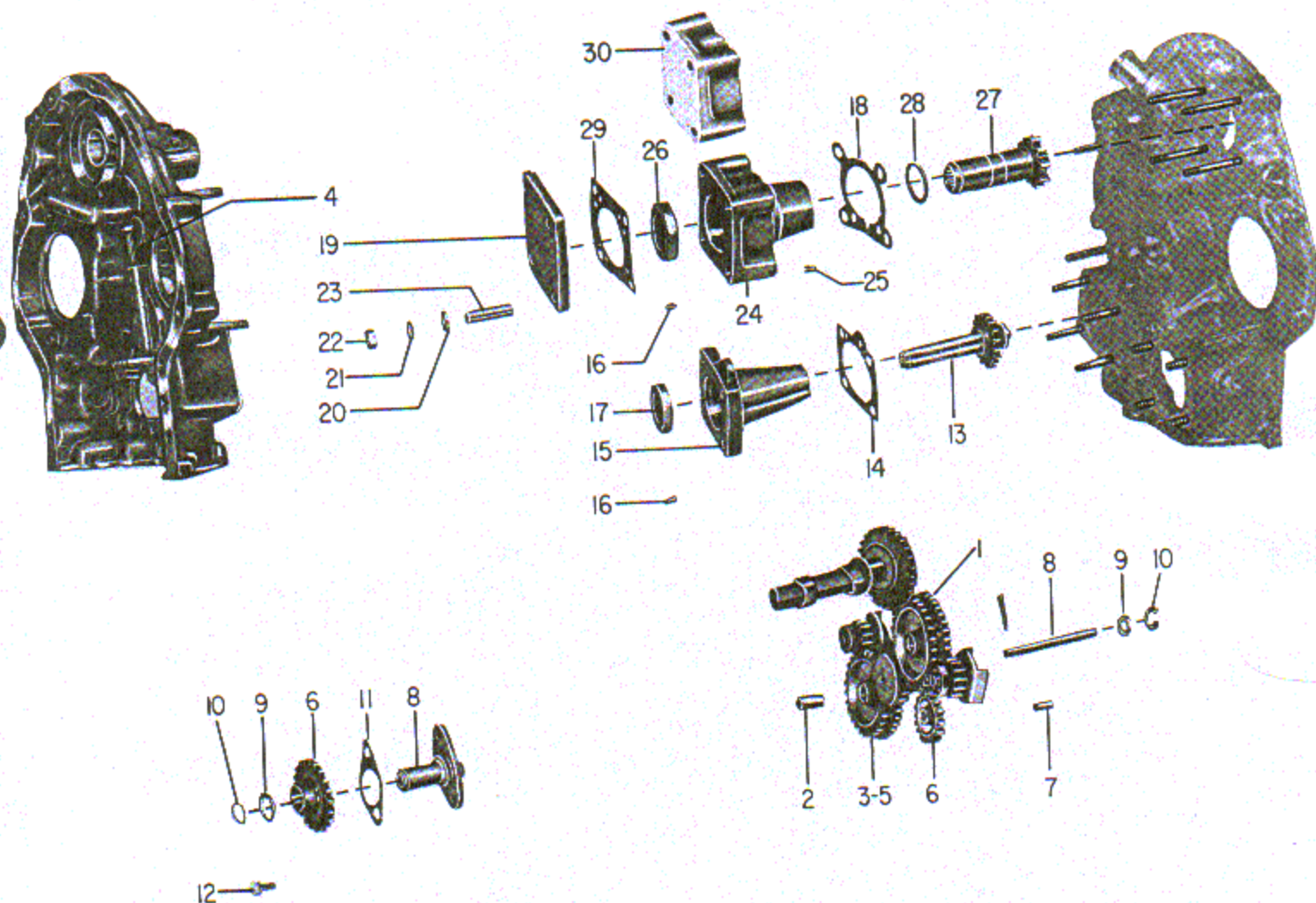


Figure 9

**ACCESSORY HOUSING AND ACCESSORY DRIVES
HYDRAULIC PUMP DRIVE**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	P1A5	
1	69551	GASKET, Accessory drive adapter	1			1	1	1	1			1	1	1	1		1	1	1						1		
2	69106	COVER, Governor drive adapter pad	1			1	1	1	1			1	1	1	1		1	1	1						1		
		COVER ATTACHING PARTS																									
3	STD-35	WASHER, Plain,5/16 in.	4			4	4	4	4			4	4	4	4		4	4	4						4		
4	STD-475	WASHER, Internal lock,5/16 in.	4			4	4	4	4			4	4	4	4		4	4	4						4		
5	STD-1410	NUT, Plain,5/16-18	4			4	4	4	4			4	4	4	4		4	4	4						4		
6	72964	GEAR ASSEMBLY, Hydraulic pump driven	1	1	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
	76743	GEAR ASSEMBLY, Hydraulic pump drive									1								1								
7	71596	WASHER, Accessory driven gear	1	1	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
8	68315	GASKET, Accessory drive adapter	1	1	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
9	71675	ADAPTER ASSEMBLY, Hydraulic pump	1	1	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
	76713	ADAPTER ASSEMBLY, Hydraulic pump								1									1								
	LW-10807	ADAPTER ASSEMBLY, Hydraulic pump																							1		
10	STD-208	SEAL, Oil,7/8 ID x 1-1/2 OD x 5/16 in. wide	1	1	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
11	69942	STUD, 1/4-20 x 1-17/32 in.long	4	4	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
	25C-32	STUD, 1/4-20 x 4.00 in.long																							4		
12	STD-1774	PIN, 1/8 in.dia.x 1/4 in.long	1	1	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
		ADAPTER ATTACHING PARTS																									
13	STD-35	WASHER, Plain,5/16 in.	4	4	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
14	STD-475	WASHER, Internal lock,5/16 in.	4	4	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
15	STD-1410	NUT, Plain,5/16-18	4	4	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
16	AN4045-1	GASKET, Vacuum pump	1	1	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
	8313	GASKET, Vacuum pump								1									1								
17	60430	COVER, Vacuum pump	1	1	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
18	LW-10806	SPACER, Hydraulic pump stud																							4		
		COVER ATTACHING PARTS																									
19	STD-8	WASHER, Plain,1/4 in.	4	4	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
20	STD-160	WASHER, Internal lock,1/4 in.	4	4	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
21	STD-1411	NUT, Plain,1/4-20	4	4	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	

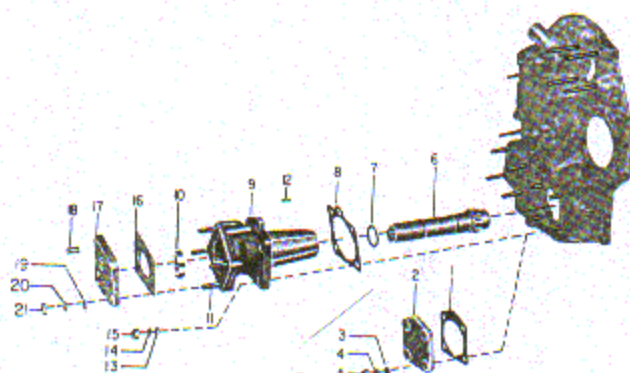


Figure 10
2-5

ACCESSORY HOUSING AND ACCESSORY DRIVES FUEL PUMP ASSEMBLY AND ATTACHING PARTS

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J1A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
1	60096	GASKET, Fuel pump				1	1	1																	1		
2	75247*	FUEL PUMP ASSEMBLY				1	1	1																	1		
		PUMP ATTACHING PARTS																									
3	STD-33	WASHER, Plain,3/8 in.				2	2	2																	2		
4	STD-1882	SCREW, Socket hd.,drilled hd.,3/8-16 x 1-9/32 in.long				2	2	2																	2		
5	1691-C	GASKET, Fuel pump	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1		1		
6	60431**	COVER, Fuel pump	1	1	1			1	1	1	1				1	1				1	1						
		COVER ATTACHING PARTS																									
7	STD-35	WASHER, Plain,5/16 in.	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
8	STD-475	WASHER, Internal lock,5/16 in.	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
9	STD-1410	NUT, Plain,5/16-18	4	4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
	74547+	FUEL PUMP ASSEMBLY									1	1	1				1	1							1		
	76486+	FUEL PUMP ASSEMBLY								1		1						1	1								
	78993+	FUEL PUMP ASSEMBLY									1									1	1		1	1	1		
10	LW-10799	SPACER, Fuel pump insulating								1	1	1						1	1	1	1		1	1	1		

* - Dual diaphragm fuel pump. High pressure.

** - "AN" fuel pump cover.

+ - Lear-Siegler fuel pump for "AN" drive.

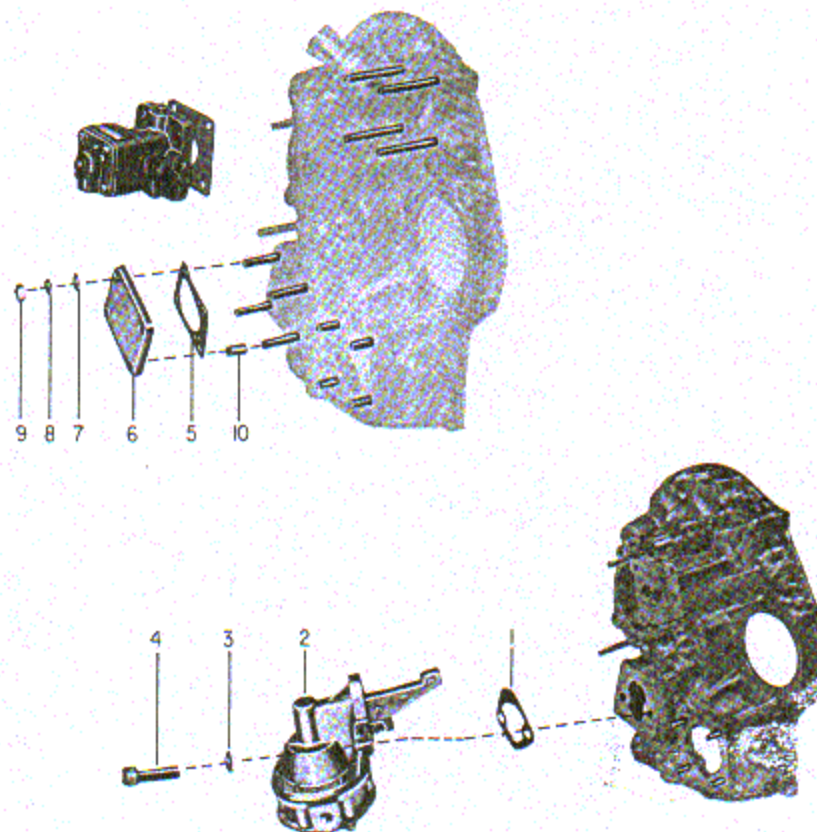


Figure 11

ACCESSORY HOUSING AND ACCESSORY DRIVES

OIL PRESSURE SCREEN, OIL FILTER AND OIL COOLER BYPASS VALVE ASSEMBLIES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	
1	62817	SCREEN ASSEMBLY, Oil pressure	1	1	1	1	1	1	1	1	1	1	1	1	1	1		1	1	1	1						
2	61173	GASKET, Oil pressure housing	1	1	1	1	1	1	1	1	1	1	1	1	1	1		1	1	1	1						
3	68974	HOUSING, Oil pressure screen																	1								
	69510	HOUSING, Thermo.valve and oil pressure screen																1		1	1						
HOUSING ATTACHING PARTS																											
4	STD-8	WASHER, Plain,1/4 in.	4	4	4	4	4	4	4	4	4	4	4	4	4	4		4	4	4	4						
5	STD-1884	SCREW, Fill.hd.,self-locking,1/4-20 x 1.00 in.long	4	4	4	4	4	4	4	4	4	4	4	4	4	4		4	4	4	4						
6	STD-294	GASKET, 7/8 OD x 5/8 ID x 3/32 annular	1	1	1	1	1	1	1	1	1	1	1	1	1	1		1	1	1	1						
7	LW-10269	VALVE ASSEMBLY, Temp.control,oil cooler bypass (alternate)	1	1	1	1	1	1	1	1	1	1	1	1	1	1		1	1	1	1						
8	76691	GASKET, Oil filter adapter	2					2	2			2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
9	77853*	OIL FILTER HOUSING ASSEMBLY (Torque 20-25 ft.lbs.)	1					1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
10	77852	OIL FILTER BASE ASSEMBLY	1					1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
FILTER ATTACHING PARTS																											
11	STD-8	WASHER, Plain,1/4 in.	4					4	4			4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4
12	STD-160	WASHER, Internal lock,1/4 in.	1					1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
13	STD-1411	NUT, Plain,1/4-20	1					1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
14	STD-1856	SCREW, Hex.hd.,self-locking,1/4-20 x 1.00 in.long	3					3	3			3	3	3	3	3	3	3	3	3	3	3	3	3	3	3	3
	75944	VALVE ASSEMBLY, Temp.control,oil cooler bypass	1					1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
15	25C-10**	STUD, 1/4-20 x 1-1/4 in.long (Driven height 0.60 to 0.64 in.)	1					1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
16	STD-294	GASKET, 7/8 OD x 5/8 ID x 3/32 annular																									1
17	69675	CONNECTOR, Accessory housing to oil cooler inlet hose		1		1	1	1				1	1	1	1	1	1		1	1	1	1					
18	71600	ADAPTER, Oil cooler connection				1			1									1	1								
19	62417	PLUG, Oil cooler bypass	1	1	1					1	1	1			1		1	1	1			1	1	1	1	1	1
20	STD-784	PLUG, Socket,3/8 in.NPT	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
	STD-784+	PLUG, Socket,3/8 in.NPT																					1				
21	71651	FITTING, Breather		1		1	1	1	1			1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
	72996	FITTING, Breather (short)	1	1	1					1	1	1			1			1	1								
22	AN-823-8D\$	ELBOW, 1/2 in.flared tube,3/8 in.pipe thread, 45°																						1			
23	AN-822-8†	ELBOW, 1/2 in.flared tube,3/8 in.pipe thread, 90°												1					1	1					1		
24	AN-823-8*+	ELBOW, 1/2 in.flared tube,3/8 in.pipe thread, 45°												1							1					1	

* - AC oil filter.

** - Assemble in accessory housing filter pad at lower left tapped hole.

+ - Assemble in upper oil cooler boss.

\$ - Assemble in lower oil cooler boss with fitting end down, turned approx. 5° toward vertical centerline.

† - Assemble in lower oil to cooler boss. To be assembled with fitting end toward right approx. 30° down from horizontal.

*+ - Assemble in oil from cooler boss. To be assembled with fitting end toward left approx. 5° up from horizontal.

ACCESSORY HOUSING AND ACCESSORY DRIVES OIL PRESSURE SCREEN, OIL FILTER AND OIL COOLER BYPASS VALVE ASSEMBLIES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL							
			A1A5	B1A5	B1C5	C1B5	CAB5	CAC5	DAA5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	JAA5	K1A5		K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5
25	AN844-16D*\$	ELBOW, 3/4 in.pipe thd.,1.00 ID hose, 45° (breather fitting)											1							1						1
26	AN816-8*†	NIPPLE, 1/2 in.flared tube,3/8 pipe thread																		1						

*\$ - Assemble in breather boss approx. 5° aft. looking down on top of engine.

*† - Assemble in oil from cooler boss. (Not illustrated.)

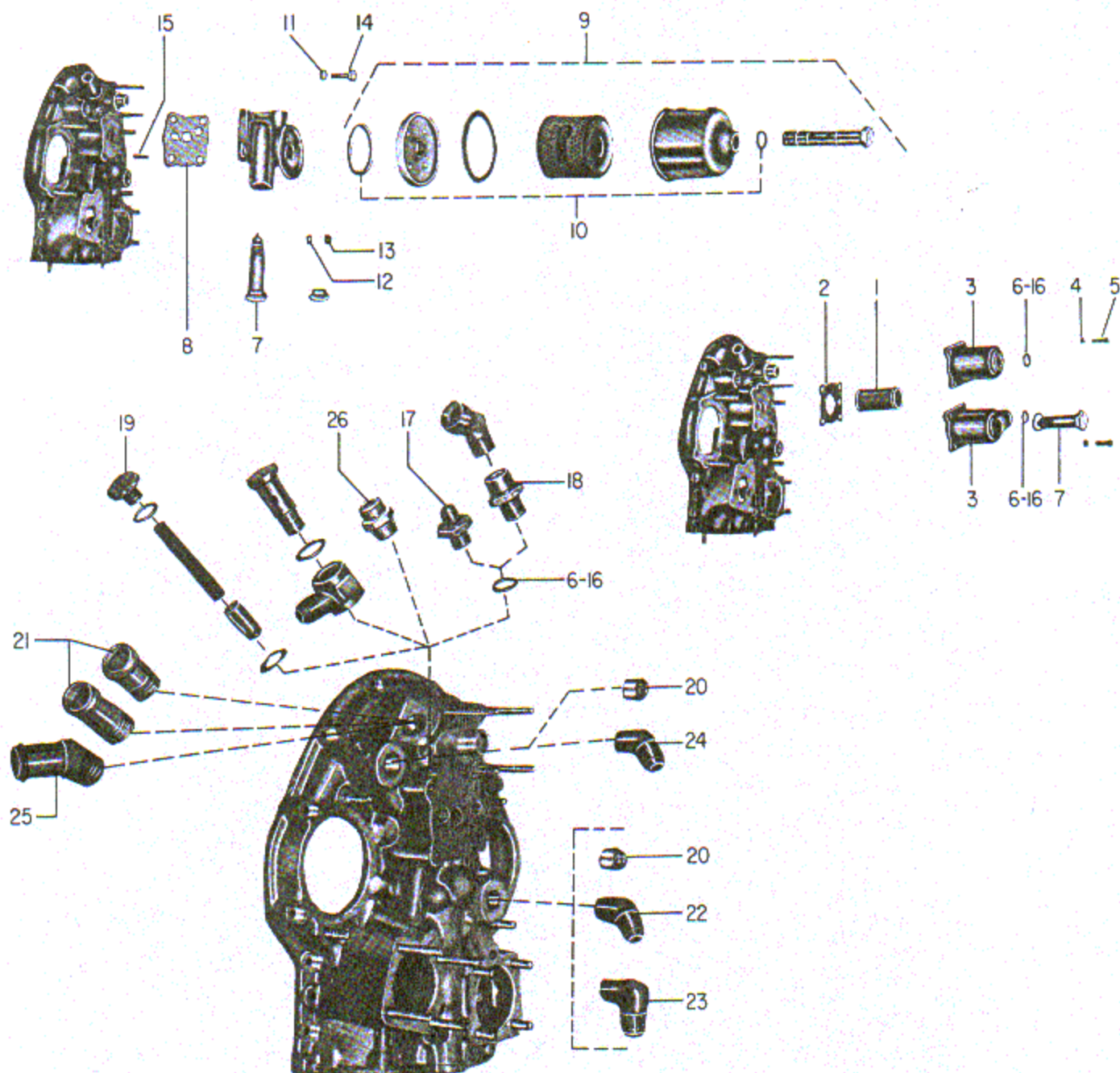


Figure 12

CYLINDER, PISTON AND VALVE TRAIN CONNECTING RODS, PISTONS AND RING ASSEMBLIES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL
			ATA5	BTA5	BIC5	CIB5	CAB5	CAC5	DAA5	EIA5	ETB5	GIA5	GIB5	GIC5	GID5	GIE5	GIF5	JAA5	
1	LW-11750	CONNECTING ROD ASSEMBLY	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	LW-10646	CONNECTING ROD ASSEMBLY																6	6
2	65819	BUSHING, Connecting rod, upper																6	6
3	75061	BOLT, Connecting rod	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12
	75060	BOLT, Connecting rod																12	12
4	LW-12186	NUT, Connecting rod bolt																	12
5	72218	BEARING, Connecting rod	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12
	74309	BEARING, Connecting rod																12	12
6	75089	PISTON, Compression ratio 8.50:1					6	6	6	6								6	6
	LW-10207	PISTON, Compression ratio 8.7:1	6	6	6						6	6	6	6	6	6	6	6	6
7	69650	PIN, Piston																	6
8	60828	PLUG, Piston pin																	12
	72198	PLUG, Piston pin	12	12		12	12			12		12							12
9	74241*	RING, Piston, top compression																	
	74673**	RING, Piston, top compression	12	12		12	12			12		12							
10	73857*	RING, Piston, oil reg. expander type																	6
	73998**	RING, Piston, oil reg. expander type	6	6		6	6			6		6							

* - These are chrome plated rings for nitrided barrels. They are half-wedge type.

NOTE

Chrome or nitrided cylinders are optional on all models. Above listing shows type of cylinder as shipped from the factory.

** - These are plain steel, half-wedge rings for chrome cylinder barrels.

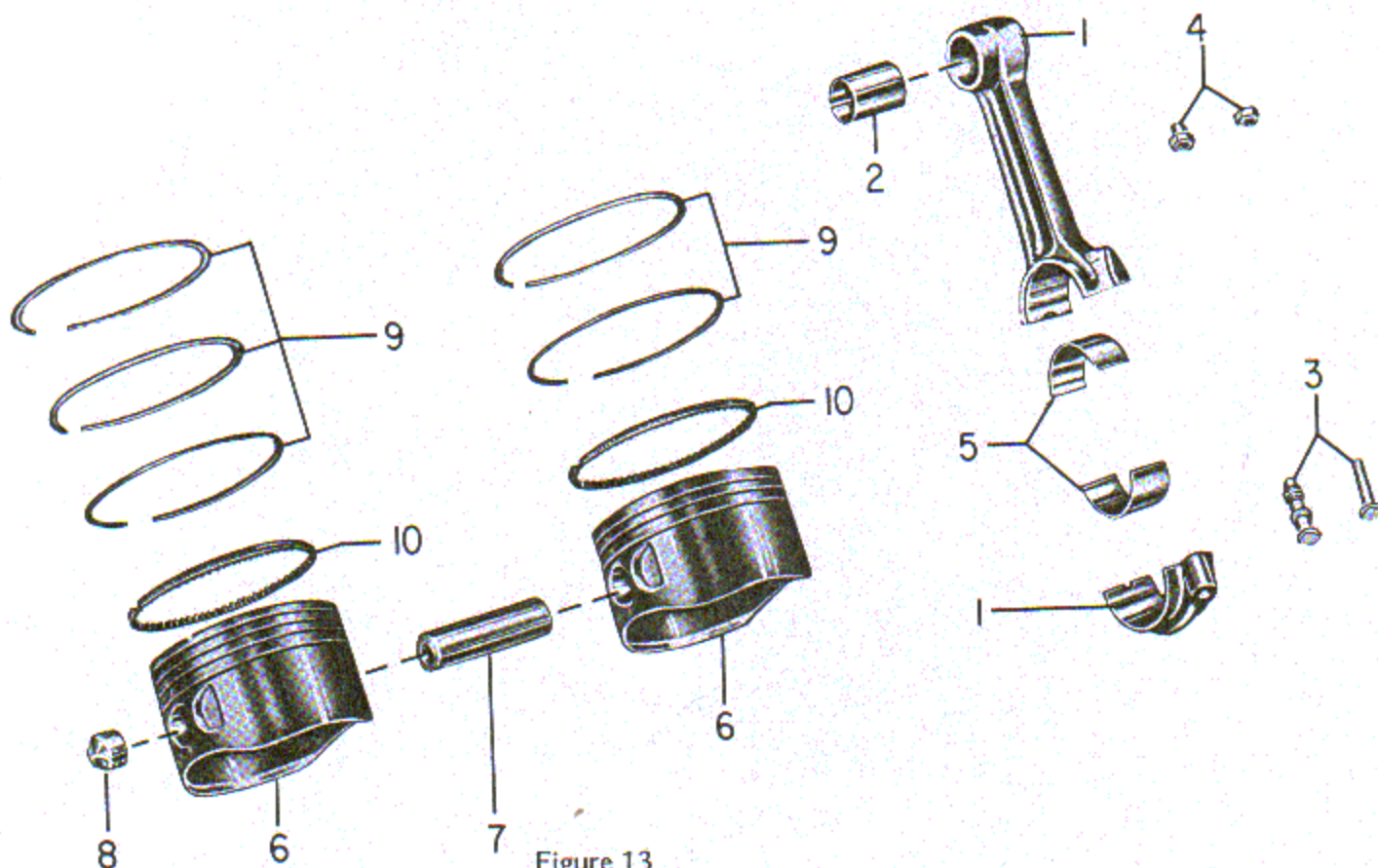


Figure 13

CYLINDER, PISTON AND VALVE TRAIN
CYLINDER ASSEMBLY

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
1	74924*	CYLINDER AND HEAD ASSEMBLY				6	6	6	6																6		
	74925**	CYLINDER AND HEAD ASSEMBLY				6	6																				
	76189+	CYLINDER AND HEAD ASSEMBLY		6						6																	
	76190†	CYLINDER AND HEAD ASSEMBLY		6	6					6	6																
	73948†	CYLINDER AND HEAD ASSEMBLY	6								6	6	6	6	6			6	6	6	6						
	75415\$	CYLINDER AND HEAD ASSEMBLY																					6				
	74507+	CYLINDER AND HEAD ASSEMBLY	6									6															
	74564**	CYLINDER AND HEAD ASSEMBLY	6																								
	75717&	CYLINDER AND HEAD ASSEMBLY									6	6	6	6	6	6			6	6			6			6	
	76087&	CYLINDER AND HEAD ASSEMBLY																6								6	
2	72057	SEAT, Intake valve				6	6	6	6									6						6		6	
	72212	SEAT, Intake valve	6	6	6					6	6	6	6	6	6	6	6		6	6	6	6	6	6	6	6	
3	72058	SEAT, Exhaust valve				6	6	6	6									6						6		6	
	71894	SEAT, Exhaust valve	6	6	6					6	6	6	6	6	6	6	6		6	6	6	6	6	6	6	6	
4	60028	GUIDE, Intake valve				6	6	6	6									6						6		6	
	66713	GUIDE, Intake valve	6	6	6					6	6	6	6	6	6	6	6		6	6	6	6	6	6	6	6	
5	74230*+	GUIDE, Exhaust valve				6	6	6	6									6						6		6	
	72897	GUIDE, Exhaust valve	6	6	6					6	6	6	6	6	6	6			6	6	6	6					
	75838*+	GUIDE, Exhaust valve	6								6	6	6	6	6	6			6	6			6			6	
6	66796-P10	INSERT, Heli-coil,spark plug, 18-1.5 MM	6	6	6	6	6	6	6	6	6	6	6	6	6	6			6	6	6	6			6		
	69260-P10	INSERT, Heli-coil,spark plug, 18-1.5 MM (long reach)										6	6	6	6	6	6	6		6	6			6	6	6	
7	61261	STUD, 5/16-18 x 1-1/2 in.long	12			12	12	12	12			12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	
	31C-10	STUD, 5/16-18 x 1-1/4 in.long		18	18					18	18													18			
8	68510	STUD, 1/4-20 x 1-1/16 in.long				6	6	6	6									6						6		6	
9	25C-8	STUD, 1/4-20 x 1.00 in.long	24									24	24	24	24	24	24		24	24	24	24	24		24		
10	AN823-6D	ELBOW, Flared tube coupling,45°																								6	
11	66610	BUSHING, Rocker shaft				24	24	24	24									24						24		24	
	66670	BUSHING, Rocker shaft		18	18					18	18												18				
	66670	BUSHING, Rocker shaft	24									24	24	24	24	24	24		24	24	24	24	24		24		
	71451	BUSHING, Rocker shaft		6	6					6	6												6				
12	STD-1872	INSERT, Heli-coil,1/8-27 taper pipe thread	12			12	12	12	12			12	12	12	12	12			12	12	12	12			12		
	STD-1872	INSERT, Heli-coil,1/8-27 taper pipe thread		6	6					6	6	6	6	6	6	6	6	6		6	6			6	6	6	
	72706	INSERT, Heli-coil,self-locking, 1/4-20 NC x 3/8 in.long		24	24					24	24													24			
13	1102*†	PLUG, 1/8 in.pipe x 3/8 in.long	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6		6	6	6	6	6	6	6	6	
14	75151	STABILIZER, Cylinder head fins,11 teeth		6	6					6	6													6			
15	75152	STABILIZER, Cylinder head fins,7 teeth		6	6					6	6													6			
16	75164	STABILIZER, Cylinder head fins,13 teeth		6	6					6	6													6			
	72343	STABILIZER, Cylinder head fins,15 teeth	6									6	6	6	6	6	6		6	6	6	6	6		6		
	72344	STABILIZER, Cylinder head fins,26 teeth	6									6	6	6	6	6	6		6	6	6	6	6		6		

* - Nitrided cylinders,1/2 in.dia.
ni-resist exhaust valve guide.
** - Chrome cylinders,1/2 in.dia.
ni-resist exhaust valve guide.
+ - Chrome cylinders,no ni-resist
exhaust valve guide.

† - Nitrided cylinders,no ni-resist
exhaust valve guides.
\$ - Up exhaust,shell molded heads,
nitrided with ni-resist exhaust valve
guide.

& - Nitrided cylinders,ni-resist exhaust
valve guide,long reach spark plugs.
*+ - 1/2 in.dia.ni-resist exhaust valve
guide.
*† - Assemble in cylinder heads on all
models except IO-540-J4A5 and
IO-540-R1A5.

**CYLINDER, PISTON AND VALVE TRAIN
CYLINDER ASSEMBLY**

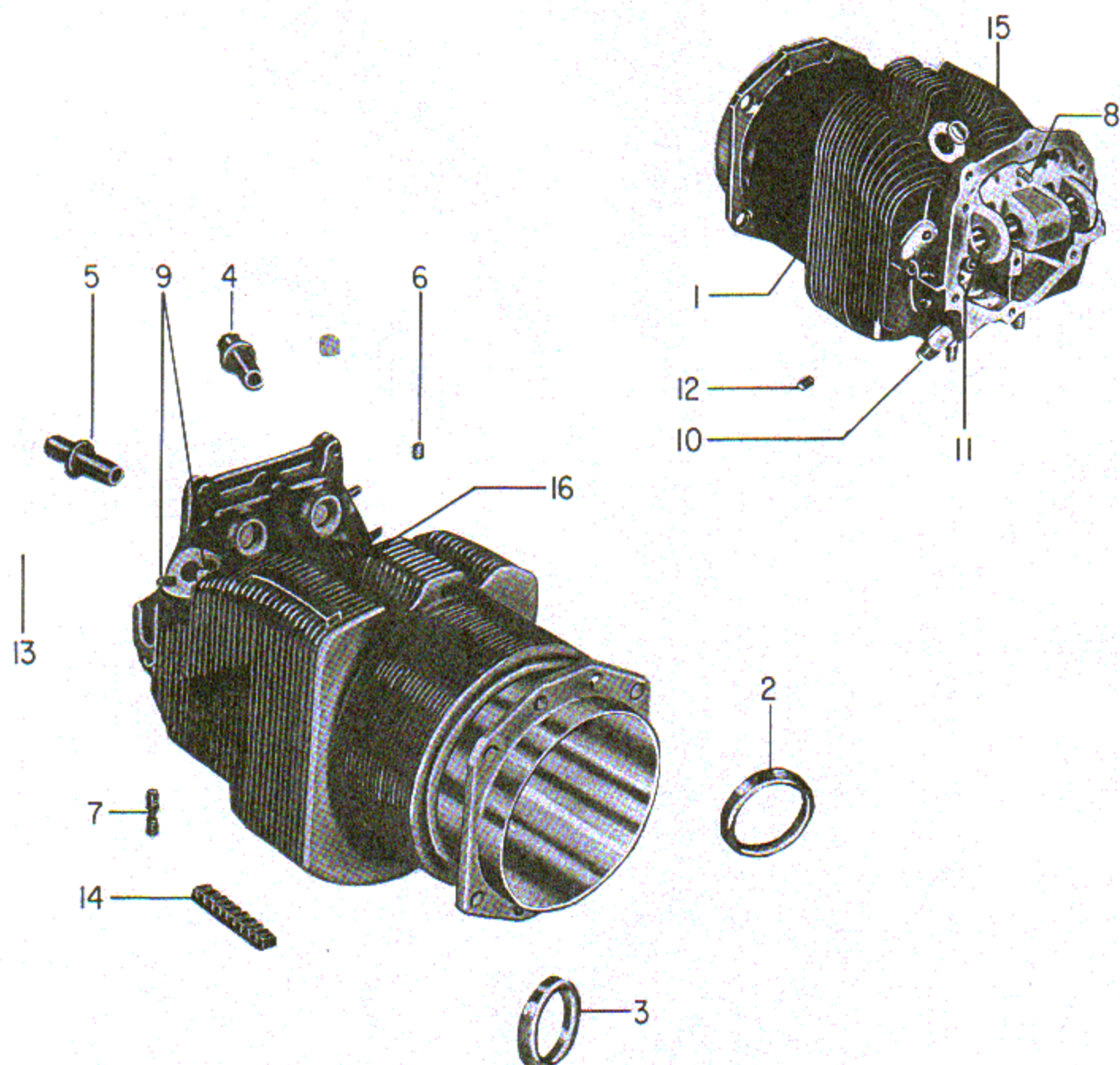


Figure 14
3-3

CYLINDER, PISTON AND VALVE TRAIN
VALVE ASSEMBLY

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C1B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
1	73938	VALVE, Intake				6	6	6	6								6							6	6		
	73117	VALVE, Intake		6	6	6				6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6		
2	74541*	VALVE, Exhaust, rotator type				6	6	6	6															6			
	LW-11250**	VALVE, Exhaust, rotator type																					6				
	73111+	VALVE, Exhaust, rotator type		6	6	6				6	6	6	6	6	6	6		6	6	6	6						
	74802†	VALVE, Exhaust, rotator type		6							6	6	6	6	6	6			6	6		6			6		
	76081\$	VALVE, Exhaust, rotator type															6								6		
3	65441	SEAT, Valve spring lower,intake				6	6	6	6								6						6	6	6		
	LW-10077	SEAT, Valve spring upper,intake		6	6	6	6	6	6	6	6	6	6	6	6	6	6	6				6	6	6	6	6	
4	74554	SEAT, Valve spring lower,exhaust				6	6	6	6								6						6	6	6		
	LW-10076	SEAT, Valve spring upper,exhaust		6	6	6	6	6	6	6	6	6	6	6	6	6	6	6				6	6	6	6	6	
	68325	SEAT, Valve spring lower		6	6	6				6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6		
	73112	SEAT, Valve spring lower		6	6	6				6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6		
5	LW-11800	SPRING, Valve,outer				12	12	12	12								12							12	12		
	LW-11796	SPRING, Valve,outer		12	12	12				12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12		
6	LW-11795	SPRING, Valve,auxiliary				12	12	12	12														12				
	LW-11797	SPRING, Valve,auxiliary		12	12	12				12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12		
	LW-11795	SPRING, Valve,inner															12								12		
7	60009	KEY, Valve,intake																							12		
8	MS13997-3	KEY, Valve exhaust,rotator type																							12		
9	MS13998-3	CAP, Valve stem,exhaust,rotator type																							6		
10	1102	PLUG, Allen hd.,1/8-27 NPT x 3/8 long				6	6	6									6								6		

* - 1/2 in.stem dia.,chrome plated stem, rotator type,exhaust valve.
 ** - 1/2 in.stem dia.,sodium cooled, chrome stem,XBE material,rotator type exhaust valve. Engine model IO-540-M1A5 does not require an inconel valve.

+ - 1/2 in.stem dia.,sodium cooled, rotator type exhaust valve for angle valve head cylinders.

† - 1/2 in.stem dia.,rotator type, inconel exhaust valve for angle valve head cylinders.
 \$ - 1/2 in.stem dia.,rotator type, inconel exhaust valve.

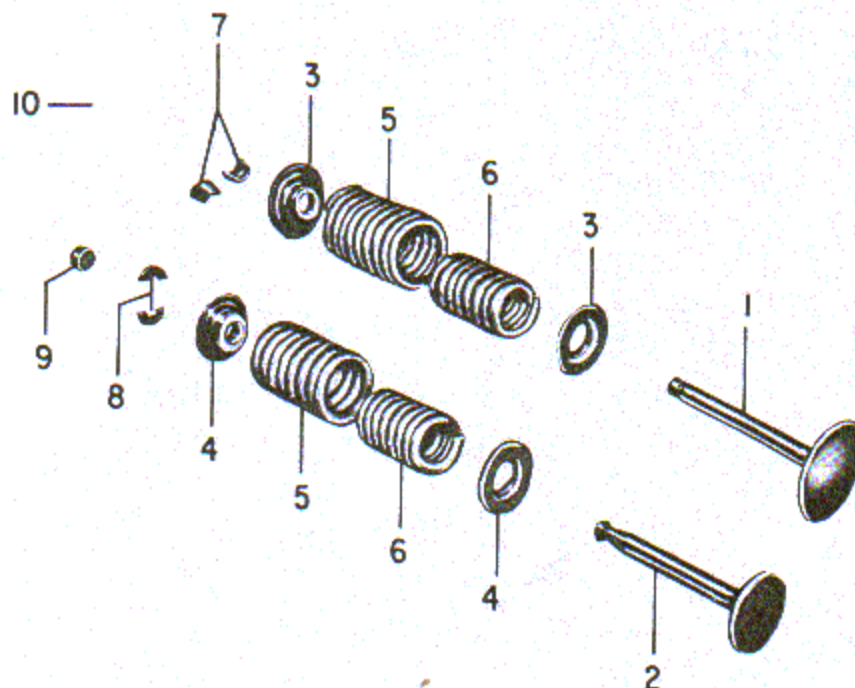


Figure 15

CYLINDER, PISTON AND VALVE TRAIN

CYLINDER HOLD DOWN PLATES, SHROUD TUBES AND PUSH ROD ASSEMBLIES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
1	71481	RING, Oil seal, 3/32 dia. section x 4-27/32 ID																									6
2	69531	PLATE, Cylinder hold down nut	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12			12	12	12	12	12	12	12	
	69531	PLATE, Cylinder hold down nut												11				11	11		11						
	74327*	PLATE, Cylinder hold down nut											1					1	1		1						
3	71133	NUT, Cylinder hold down, 1/2-20 NF-3																									24
4	71134	NUT, Cylinder hold down, 3/8-24 NF-3																									24
5	62922	SEAL, Shroud tube																									12
6	70310	SEAL, Shroud tube				12	12	12	12								12							12		12	
	LW-11694**	SEAL, Shroud tube	12	12	12					12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	
7	LW-11485	TUBE, Push rod shroud				12	12	12	12								12							12		12	
8	69345	SPACER, Shroud tube spring				6	6	6	6								6							6		6	
	72255	SHROUD TUBE ASSEMBLY, Push rod (intake)		6	6					6	6													6			
	72257	SHROUD TUBE ASSEMBLY, Push rod (exhaust)		6	6					6	6													6			
	72255	SHROUD TUBE ASSEMBLY	12									12	12	12	12	12	12	12	12	12	12	12	12		12		
9	68517	SPRING, Shroud tube				12	12	12	12								12							12		12	
	79051	SPRING, Shroud tube	12	12	12					12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	
10	68518	LOCKPLATE, Shroud tube				6	6	6	6								6							6		6	
11	STD-1411	NUT, Plain, 1/4-20				6	6	6	6								6							6		6	
12	66728+	WASHER, 25/32 ID x 1-1/4 OD x 1/32 in. thick	un	un	un					un	un	un	un	un	un	un	un	un	un	un	un	un	un	un	un	un	
13	61503	SLEEVE, Shroud tube seal	12	12	12					12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	
14	73434†	ROD ASSEMBLY, Push				un	un	un	un								un							un		un	
	73435†	ROD ASSEMBLY, Push				un	un	un	un								un							un		un	
	73436†	ROD ASSEMBLY, Push				un	un	un	un								un							un		un	
	73455\$	ROD ASSEMBLY, Push, intake		un	un					un	un													un			
	73456\$	ROD ASSEMBLY, Push, intake		un	un					un	un													un			
	73457\$	ROD ASSEMBLY, Push, intake		un	un					un	un													un			
	73458\$	ROD ASSEMBLY, Push, intake		un	un					un	un													un			
	73446\$	ROD ASSEMBLY, Push, exhaust		un	un					un	un													un			
	73445\$	ROD ASSEMBLY, Push, exhaust		un	un					un	un													un			
	73447\$	ROD ASSEMBLY, Push, exhaust		un	un					un	un													un			
	73448\$	ROD ASSEMBLY, Push, exhaust		un	un					un	un													un			
	73455&	ROD ASSEMBLY, Push	un									un	un	un	un	un	un	un	un	un	un	un	un			un	
	73456&	ROD ASSEMBLY, Push	un									un	un	un	un	un	un	un	un	un	un	un	un			un	
	73457&	ROD ASSEMBLY, Push	un									un	un	un	un	un	un	un	un	un	un	un	un			un	
	73458&	ROD ASSEMBLY, Push	un									un	un	un	un	un	un	un	un	un	un	un	un			un	
	73556*+	ROD ASSEMBLY, Push	un									un	un	un	un	un	un	un	un	un	un	un	un			un	
	73557*+	ROD ASSEMBLY, Push	un									un	un	un	un	un	un	un	un	un	un	un	un			un	
	73555*+	ROD ASSEMBLY, Push	un									un	un	un	un	un	un	un	un	un	un	un	un			un	
	73558*+	ROD ASSEMBLY, Push	un									un	un	un	un	un	un	un	un	un	un	un	un			un	

* - Assemble top side no.5 cylinder.

** - For crankcase end.

+ - Use a maximum of 24 pieces.

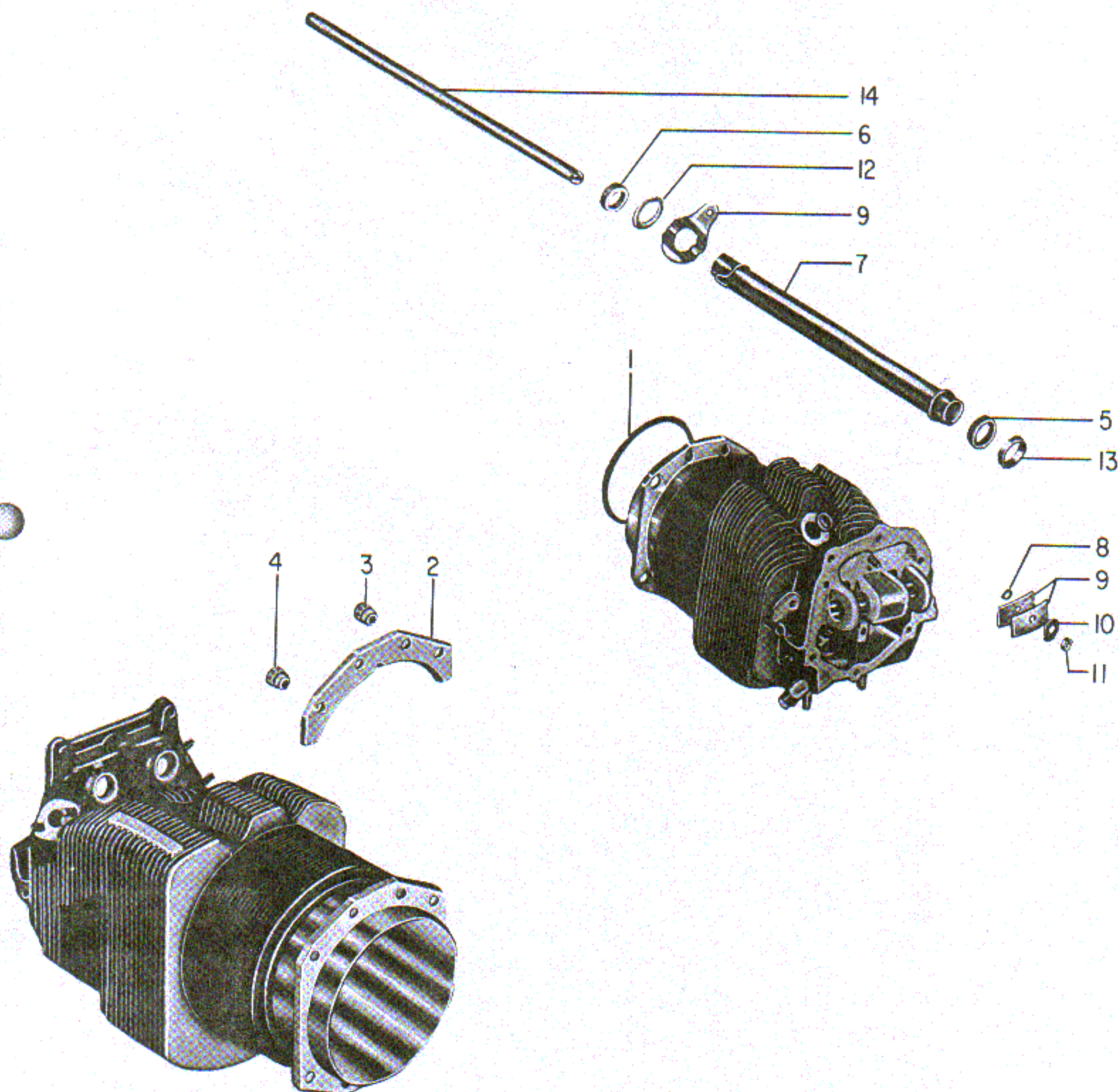
† - A total of 12 push rods required.

\$ - A total of 6 push rods required.

& - A total of 12 push rods required.

*+ - Alternate to those push rods

marked (&). A total of 12 push rods required.

CYLINDER, PISTON AND VALVE TRAIN
CYLINDER HOLD DOWN PLATES, SHROUD TUBES AND PUSH ROD ASSEMBLIES

Figure 16

CYLINDER, PISTON AND VALVE TRAIN

VALVE ROCKER ASSEMBLY, EXHAUST FLANGE AND CYLINDER HEAD DRAIN TUBES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			ATA5	BTAS	BLC5	CB5	CAB5	CAC5	DAAS	ETA5	ETB5	GTAS	GTB5	GTC5	GTD5	GTE5	JAT5	KAT5	KBT5	KCT5	KDT5	KET5	MA5	NTAS	PIAS	RIA5	
1	69444	ROCKER ASSEMBLY, Valve,intake					6	6	6	6							6							6	6		
	67113	ROCKER ASSEMBLY, Valve,intake	6	6	6					6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6		
2	60398	BUSHING, Valve rocker,intake					6	6	6	6							6							6	6		
	67114	BUSHING, Valve rocker	6	6	6					6	6	6	6	6	6	6	6	6	6	6	6	6	6		6		
3	74636*	ROCKER ASSEMBLY, Valve,exhaust					6	6	6	6							6							6	6		
	72630	ROCKER ASSEMBLY, Valve,exhaust			6	6				6	6												6				
	67112	ROCKER ASSEMBLY, Valve,exhaust	6									6	6	6	6	6	6	6	6	6	6	6	6		6		
4	74637	BUSHING, Valve rocker,exhaust					6	6	6	6							6						6	6	6		
	72705	BUSHING, Valve rocker,exhaust			6	6						6	6										6				
	67114	BUSHING, Valve rocker	6									6	6	6	6	6	6	6	6	6	6	6	6		6		
5	71549	WASHER, Valve rocker	12	12	12						12	12	12	12	12	12	12	12	12	12	12	12	12	12	12		
6	60401	SHAFT, Valve rocker					6	6	6	6							6							6	6		
	72626	SHAFT, Valve rocker	12	12	12						12	12	12	12	12	12	12	12	12	12	12	12	12	12	12		
7	75906	GASKET, Rocker box cover					6	6	6	6							6							6	6		
	71450	GASKET, Rocker box cover			6	6				6	6												6				
	67193	GASKET, Rocker box cover	6									6	6	6	6	6	6	6	6	6	6	6	6		6		
8	61247	COVER, Rocker box					6	6	6	6							6							6	6		
	72242	COVER ASSEMBLY, Rocker box			6	6					6	6											6				
	68795	COVER ASSEMBLY, Rocker box	6									6	6	6	6	6	6	6	6	6	6	6	6		6		
9	STD-1925	SCREW, Pan hd,self-locking,1/4-20 x 5/8 in. long	48	54	54	36	36	36	36	54	54	48	48	48	48	48	31	48	48	48	48	48	54	36	48	31	
10	66732	GASKET, Valve rocker shaft cover	12	12	12					12	12	12	12	12	12	12	12	12	12	12	12	12	12	12	12		
11	72710	COVER, Valve rocker shaft		12	12					12	12												12				
	66731	COVER, Valve rocker shaft	12									12	12	12	12	12	12	12	12	12	12	12		12			
12	72709	SCREW, Self-sealing,1/4-20 x 5/8 in.long	24	24						24	24												24				
13	STD-160	WASHER, Internal lock,1/4 in.	24									24	24	24	24	24	24	24	24	24	24	24		24			
14	STD-1411	NUT, Plain,1/4-20	24									24	24	24	24	24	24	24	24	24	24	24		24			
15	74494	PLATE, Spark plug reach caution	6	6	6					6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6		
16	65321**	GASKET, Exhaust flange					6	6	6	6		6						6	6				6				
	73720+	GASKET, Exhaust flange									6	6		6	6				6	6	6	6			6		
	75118†	GASKET, Exhaust flange				12	12		12			12	12					12	12	12				12	12	12	
	77611\$	GASKET, Exhaust flange																								un	
17	61260**	FLANGE, Exhaust,stainless steel						6	6			6															
	67195+	FLANGE, Exhaust	6									6	6	6	6	6				6	6			6			
	72701&	FLANGE, Exhaust		6								6															
18	STD-35	WASHER, Plain,5/16 in.	12	18	18	12	12	12	12	18	18	12	12	12	12	12	12	12	12	12	12	12	18	12	12	12	
19	STD-475	WASHER, Internal lock,5/16 in.	12	18	18	12	12	12	12	18	18	12	12	12	12	12	12	12	12	12	12	12	18	12	12	12	
20	STD-1410	NUT, Plain,5/16	12	18	18	12	12	12	12	18	18	12	12	12	12	12	12	12	12	12	12	12	18	12	12	12	
21	STD-684	NIPPLE, 3/8 in.ID hose,straight																								6	
22	STD-1821	HOSE, 3/8 in.ID x 2-1/2 in.long					6	6	6	6							6						6		6		
	STD-347	HOSE, 3/8 in.ID x 1-13/16 in.long	6	6	6					6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6		
23	STD-1924	CLAMP, Hose,1/2 to 3/4 ID x 5/8 in. wide																								12	

* - Exhaust valve rocker with drilled oil hole to bushing.
 ** - Exhaust flange and gasket,parallel valve heads (flange,stainless steel).

+ - Stainless steel exhaust flange and gasket for angle valve heads.
 † - Copper exhaust flange gasket.

\$ - Premium,reusable exhaust flange gasket. Use where required.
 & - Stainless steel exhaust flange for up exhaust heads.

CYLINDER, PISTON AND VALVE TRAIN

VALVE ROCKER ASSEMBLY, EXHAUST FLANGE AND CYLINDER HEAD DRAIN TUBES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			ATA5	BTA5	BIC5	CTB5	CAB5	CAC5	DAA5	EIA5	ETB5	GIA5	GIB5	GIC5	GID5	GIE5	JAA5	KIA5	KIB5	KIC5	KID5	KIE5	MIA5	NIA5	PIA5	RIA5	
24	68759	TUBE ASSEMBLY, Cylinder hd.oil drain, Cyl.no.1					1	1	1	1								1							1	1	
	72702	TUBE ASSEMBLY, Cylinder hd.oil drain, Cyl.no.1																1								1	
			1	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
	71737	TUBE ASSEMBLY, Cylinder hd.oil drain, Cyl.no.2																									
							1	1	1	1								1							1	1	
	72703	TUBE ASSEMBLY, Cylinder hd.oil drain, Cyl.no.2																									
			1	1	1						1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
	68761	TUBE ASSEMBLY, Cylinder hd.oil drain, Cyl.no.3-4-5-6																									
							4	4	4	4								4							4	4	
	73027	TUBE ASSEMBLY, Cylinder hd.oil drain, Cyl.no.3-4-5-6																									
			4	4	4						4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	

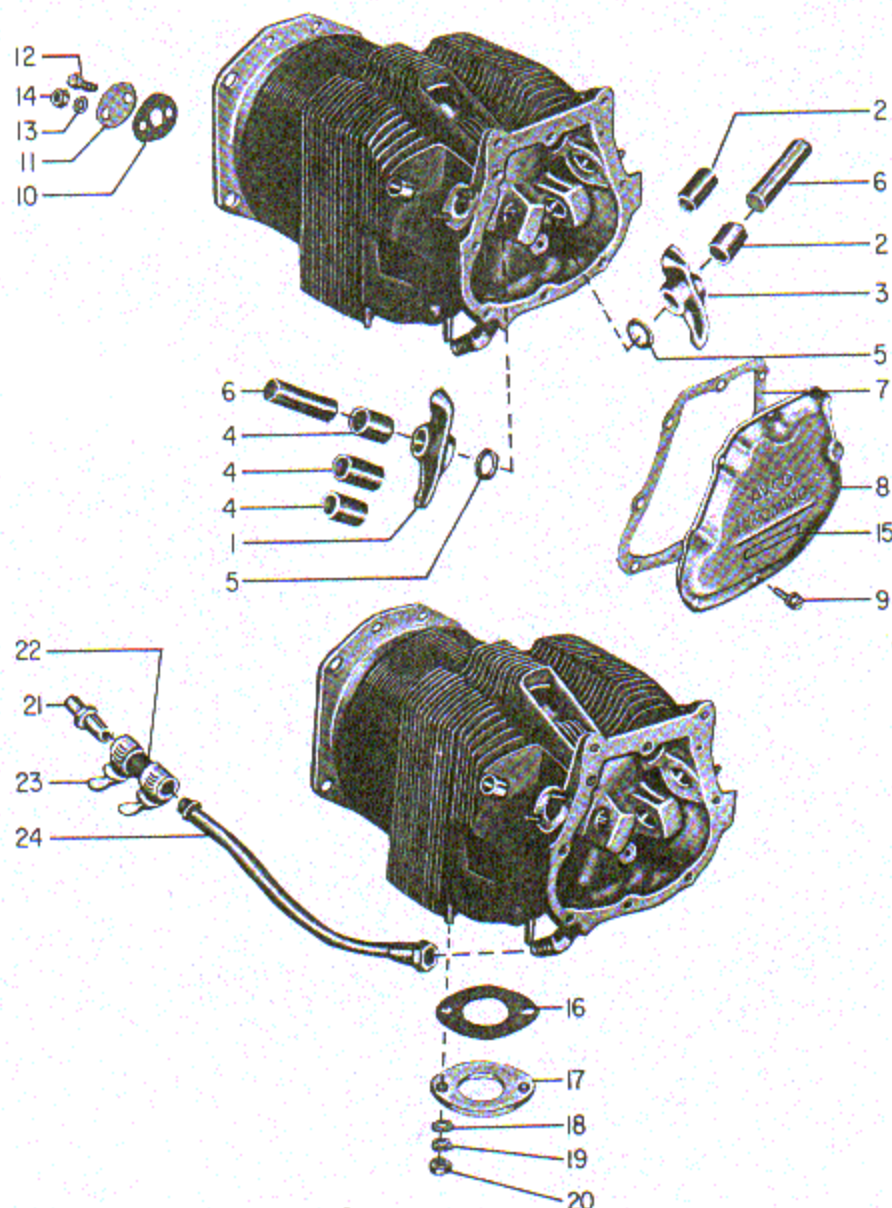
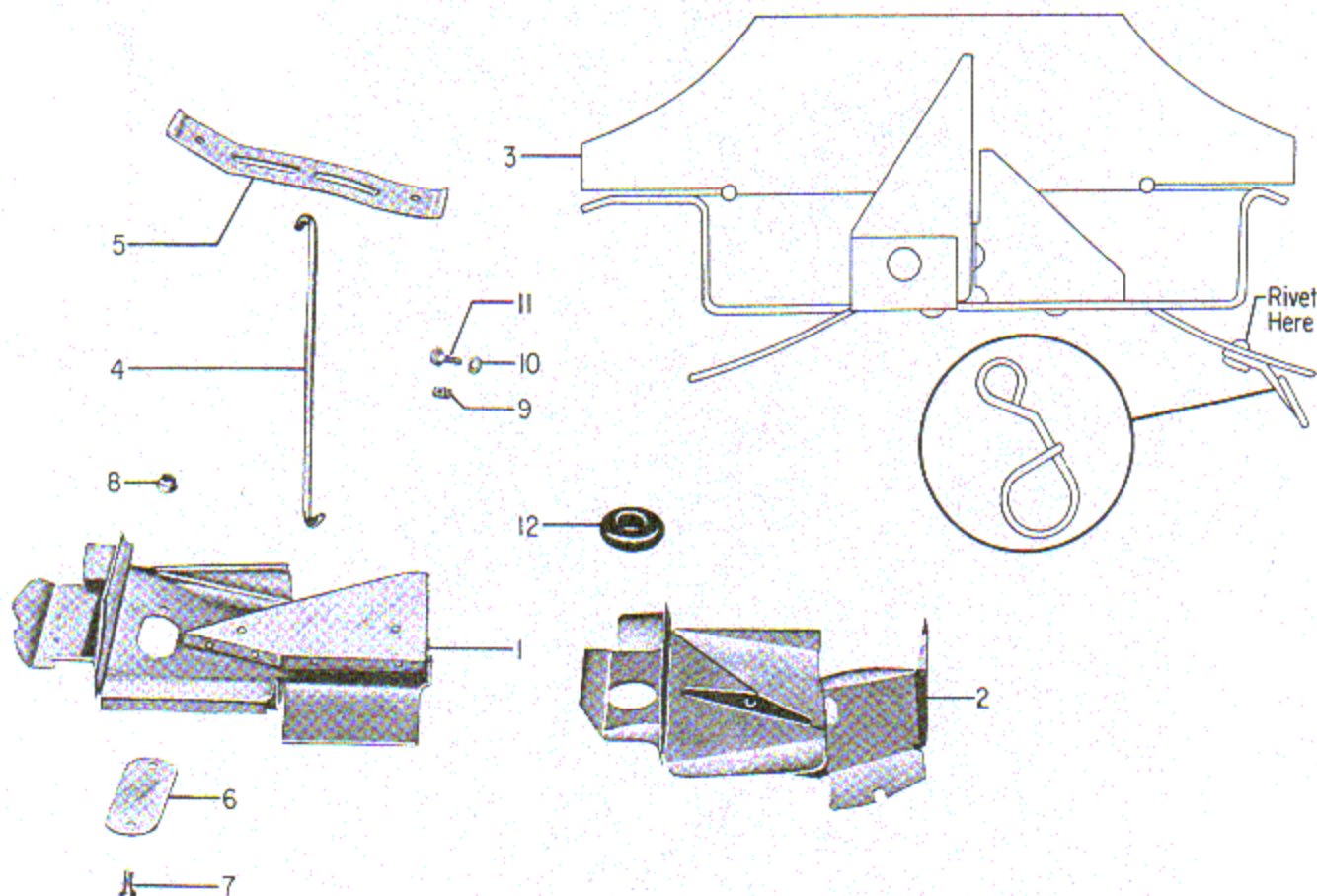


Figure 17

**CYLINDER, PISTON AND VALVE TRAIN
INTERCYLINDER COOLING BAFFLES**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL
			A1A5	B1A5	B1C5	C1B5	CAB5	CAC5	DA5	EA5	EB5	GA5	GB5	GC5	GD5	GE5	GF5	GA5	
1	72918	BAFFLE ASSEMBLY, Intercylinder		4	4					4	4								4
	74718	BAFFLE ASSEMBLY, Intercylinder	4										4	4	4	4	4	4	
	72152	BAFFLE ASSEMBLY, Intercylinder					3	3	3	3								3	3
	73975	BAFFLE ASSEMBLY, Intercylinder					1	1	1	1								1	1
2	LW-10610	BAFFLE AND CLIP ASSEMBLY, Intercylinder cylinders no.1 and 6												2				2	2
3	LW-10611	BAFFLE AND CLIP ASSEMBLY, Intercylinder cylinders no.2 and 5												2				2	2
	74718	BAFFLE ASSEMBLY, Intercylinder											4					4	
	LW-10608	CLIP, Intercylinder baffle											4					4	
	LW-10609	RIVET, Baffle clip											8					8	
4	71610	HOOK, Intercylinder baffle retainer																	4
5	71611	RETAINER, Intercylinder baffle																	4
6	72834	COVER, Baffle ignition hole	4	4	4					4	4	4	4	4	4	4	4	4	4
7	AN520-10-8	SCREW, Rd.hd.,no.10-32 x 1/2 in.long	8	8	8					8	8	8	8	8	8	8	8	8	8
8	STD-670	NUT, Self-locking,no.10-32	8										8	8	8	8	8	8	8
9	65614	PLUG, Baffle attaching	4										4	4	4	4	4	4	4
10	STD-1687	WASHER, External lock,no.10	4										4	4	4	4	4	4	4
11	STD-1686	SCREW, Fill.hd.,no.10-32 x 7/16 in.long	4										4	4	4	4	4	4	4
12	AN931-12S17	GROMMET, 3/4 ID x 1-3/8 OD x 3/8 in. thick					1	1	1	1								1	1


Figure 18

**IGNITION COMPONENTS
MAGNETOS AND MAGNETO DRIVES**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																				ON ALL			
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5		M1A5	N1A5	P1A5
1	67542	BEARING, Ball																								2
2	74830	GEAR RETAINER, Magneto drive																								2
	74830	GEAR RETAINER, Magneto drive									1															
	76498	GEAR RETAINER, Magneto drive, right									1															
3	LW-12136	CUSHION, Magneto drive																								4
4	62224	GASKET, Magneto adapter and magneto	4	4	4	4	4	4	4	4	4									4	4			4	4	
	62224	GASKET, Magneto adapter and magneto									2		2	2	2	2	2	2	2			2	2		2	2
5	73627	ADAPTER, Magneto										2		2	2	2	2	2	2			2	2		2	2
6	73000	COUPLING, Magneto drive	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
7	73013*	COUPLING, Magneto drive				1	1	1	1								1							1	1	1
	73000	COUPLING, Magneto drive, left magneto									1	1	1	1		1				1	1		1	1		
	73636	COUPLING, Magneto drive, right magneto									1	1	1	1		1				1	1		1	1		
8	78292	GASKET, Magneto									2	2			2	2	2	2	2	2	2	2	2	2	2	2
9	73038	MAGNETO (S6LN-204) Bendix P/N																								
	10-163050-9		1	1	1	1	1	1	1	1	1									1	1			1	1	
	73669**	MAGNETO (S6LN-200) Bendix P/N																								
	10-163010-10		1	1	1	1	1	1	1	1	1									1	1			1	1	
	75454+	MAGNETO (S6LN-1208)									1	1			1		1		1			1	1	1	1	
	75753†	MAGNETO (S6LN-1209) Bendix P/N																								
	10-349310-1										1	1	1	1	1		1	1	1	1			1	1	1	
	75653\$	MAGNETO (S6LN-1227) Bendix P/N																								
	10-349370-4													1	1		2	1	2			2				
	75653	MAGNETO (S6LN-1227) Bendix P/N																								
	10-349370-4																									
	LW-10172&	MAGNETO (S6LN-1209) Bendix P/N																								
	10-349310-8															1				1						
	75653	MAGNETO (S6LN-1227) Bendix P/N																								
	10-349370-4																									
		MAGNETO ATTACHING PARTS																								
10	STD-1727	WASHER, 3/4 OD x 21/64 ID x 1/8 in. thick	4	4	4	4	4	4	4	4	4									4	4			4	4	
11	STD-475	WASHER, Internal lock, 5/16 in.																								4
12	STD-1410	NUT, Plain, 5/16-18																								4
13	75965	CLAMP, Magneto									4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4
		MAGNETO KITS																								
14	LW-157209	KIT, Magneto ground terminal	2	2	2	2	2	2	2	2	2									2	2					
15	LW-157208	KIT, Magneto retard terminal	1	1	1	1	1	1	1	1	1									1	1					

* - Retard breaker coupling.
 ** - Retard breaker magneto.
 + - Retard breaker magneto.
 † - Standard magneto S6LN-1209.
 \$ - On IO-540-G1E5, -K1B5, -K1E5, installation includes two impulse coupling magnetos S6LN-1227.

& - Magneto installation includes (1) S6LN-1209 (standard) with electric tachometer pick-up and (1) S6LN-1227 impulse coupling magneto.

**IGNITION COMPONENTS
MAGNETOS AND MAGNETO DRIVES**

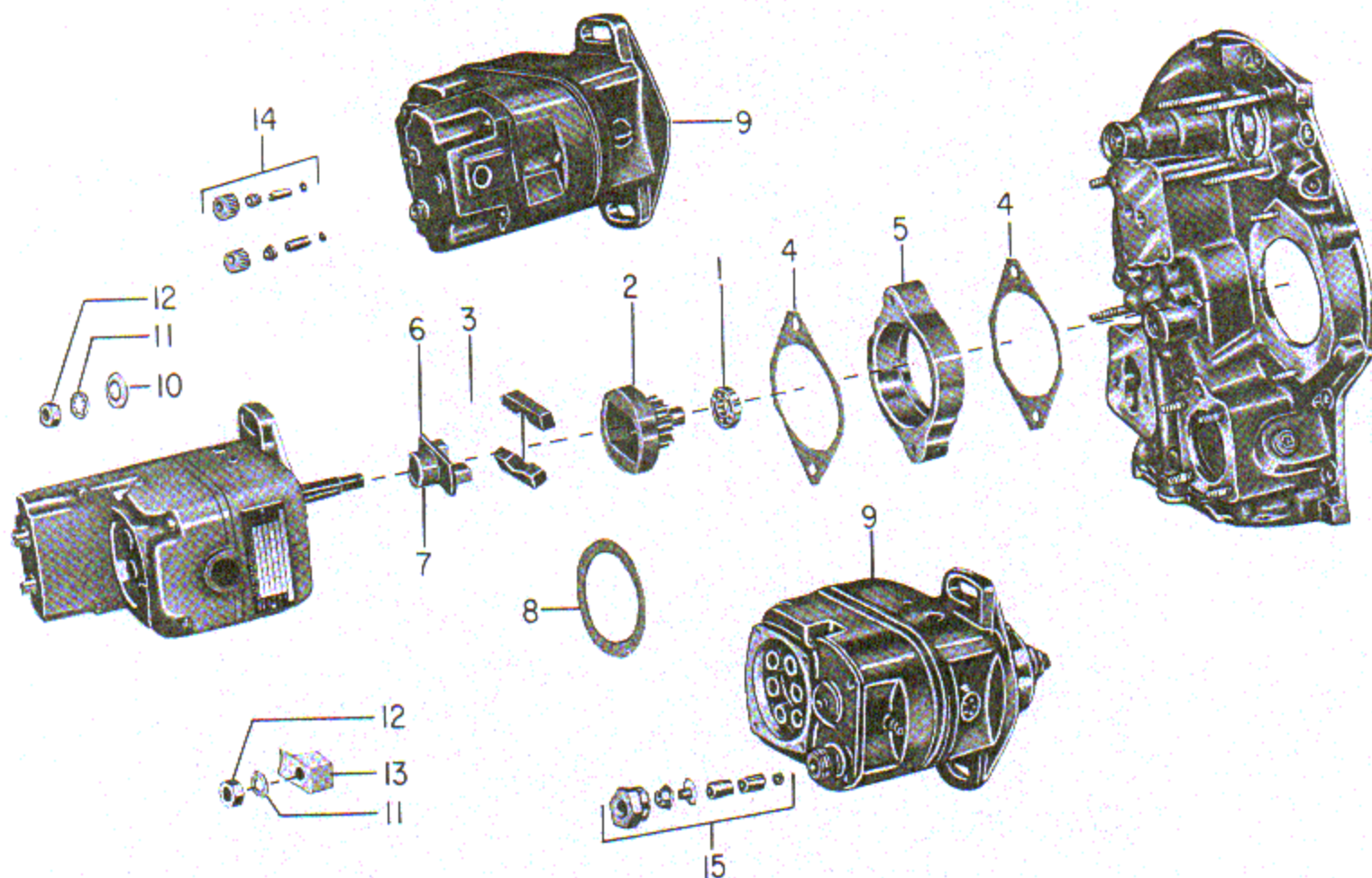


Figure 19

IGNITION COMPONENTS

IGNITION HARNESS AND IGNITION HARNESS LEAD ASSEMBLIES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL
			ATA5	BTA5	BIC5	CTB5	CAB5	CAC5	DAA5	ETA5	ETB5	GTA5	GIB5	GIC5	GID5	GIE5	JAA5	KAA5	
1	78535*	CABLE ASSEMBLY, Ignition shielded harness						1	1	1	1								
	76923-48S70-63	LEAD, All top leads and 3-4-5-6 bottom						10	10	10	10								
	76923-72S70-63	LEAD, No.1 and 2 bottom						2	2	2	2								
1A	78543**	CABLE ASSEMBLY, Ignition shielded harness						1	1										1
	76923-48S70-63	LEAD, All top leads and 3-4-5-6 bottom						10	10										10
	76923-72S70-63	LEAD, No.1 and 2 bottom						2	2										2
1B	78537+	CABLE ASSEMBLY, Ignition shielded harness	1	1	1					1	1								1
	76923-48S110-63	LEAD, All top leads	6	6	6					6	6								6
	76923-72S70-63	LEAD, No.1 and 2 bottom	2	2	2					2	2								2
	76923-48S70-63	LEAD, 3-4-5-6 bottom	4	4	4					4	4								4
1C	74774	HARNESS ASSEMBLY, Ignition shielded	1								1								1
	59080	LEAD, No.1 top	1								1								1
	59081	LEAD, No.2 top	1								1								1
	59082	LEAD, No.3 top	1								1								1
	59083	LEAD, No.4 top	1								1								1
	59084	LEAD, No.5 top	1								1								1
	59085	LEAD, No.6 top	1								1								1
	59086	LEAD, No.1 bottom	1								1								1
	59087	LEAD, No.2 bottom	1								1								1
	59088	LEAD, No.3 bottom	1								1								1
	59089	LEAD, No.4 bottom	1								1								1
	59090	LEAD, No.5 bottom	1								1								1
	59091	LEAD, No.6 bottom	1								1								1
1D	LW-620470-2†	HARNESS ASSEMBLY, Ignition assembly															1		
	10-620632-48	LEAD, 48 in.long															11		
	10-620632-72	LEAD, 72 in.long															1		
1E	LW-620465-2\$	HARNESS ASSEMBLY, Ignition																	1
	10-620633-48	LEAD, 48 in.long																	6
	10-620633-72	LEAD, 72 in.long																	6
1F	LW-620515-1&	HARNESS ASSEMBLY, Ignition								1									
	10-620632-48	LEAD, 48 in.long								10									
	10-620632-72	LEAD, 72 in.long								2									
1G	76885*+	CABLE ASSEMBLY, Ignition shielded, high temperature										1	1	1	1		1	1	
	76923-72S90-63	LEAD, No.1 top and no.1 bottom									2	2	2	2			2	2	
	76923-48S90-63	LEAD, 3-4-5-6 top									4	4	4	4			4	4	
	76923-72S110-63	LEAD, No.1 bottom									1	1	1	1			1	1	
	76923-48S110-63	LEAD, 2-3-4-5-6 bottom									5	5	5	5			5	5	

* - 5MM harness for -200 series or -21 series magnetos. Parallel valve cyl. heads.

** - Same as (*) except for long top leads (Piper installations).

+ - 5MM harness for -200 series mags. angle valve cyl.heads,up exhaust. (Can be used for down exhaust. See attaching parts.)

† - Blue harness.

\$ - Scintilla harness,blue,-1200 series magnetos. 3/4-20 spark plug nut.

& - Scintilla harness,blue,-1200 series magnetos.

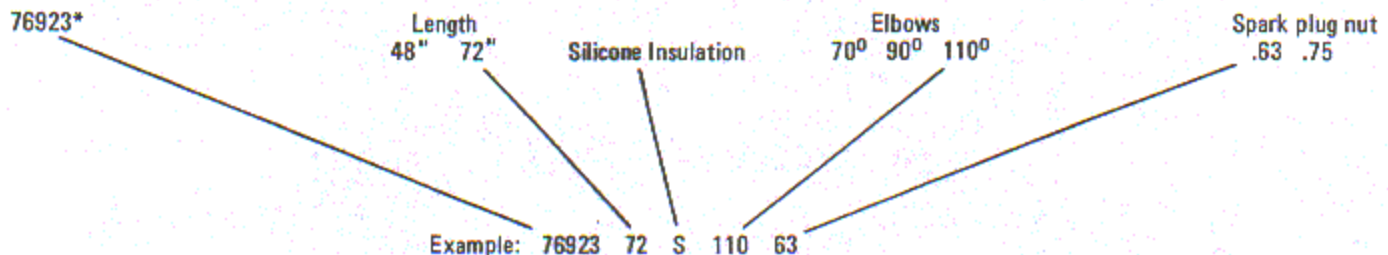
*+ - 5MM -1200 series magnetos (Vero Beach no.2).

IGNITION COMPONENTS IGNITION HARNESS RELATED PARTS

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
1H	77274&	HARNESS ASSEMBLY, Ignition																	1								
	10-320417-67	LEAD, No.1 and no.2 top																	2								
	10-320417-66	LEAD, 3-4-5-6,top and all bottom leads																	10								
1J	77514	CABLE ASSEMBLY, Ignition shielded, high temperature,5MM																									1
	76923-72S90-63	LEAD, No.1 and 2 top																									2
	76923-48S90-63	LEAD, 3-4-5-6 top																									4
	76923-48S110-63	LEAD, All bottom leads																									6
1K	LW-11194*†	CABLE ASSEMBLY, Ignition shielded, high temperature													1	1	1	1				1					
	LW-11944-48S90-75	LEAD, 3-4-5-6 top,with elbow													4	4	4	4				4					
	LW-11944-72S90-75	LEAD, No.1 and 2 top,with elbow													2	2	2	2				2					
	LW-11944-48S110-75	LEAD, 2-3-4-5-6 bottom,with elbow													5	5	5	5				5					
	LW-11944-72S110-75	LEAD, No.1 bottom,with elbow													1	1	1	1				1					
	LW-11959-48S	LEAD, Less elbow													9	9	9	9				9					
	LW-11959-72S	LEAD, Less elbow													3	3	3	3				3					
1L	78552*\$	HARNESS ASSEMBLY, Ignition												1						1	1					1	
	10-320409-127	LEAD, 48 in.long												6						6	6					6	
	10-320409-128	LEAD, 72 in.long												6						6	6					6	

*† - 5MM -1200 series magnetos, high temperature, angle valve cyl. head, 3/4-20 spark plug nut.

*\$ - Scintilla harness, blue, -1200 series magnetos, 3/4-20 spark plug nut.



1A, 1B, 1C, 1D, 1E, 1F, 1G, 1H, 1J, 1K, 1L

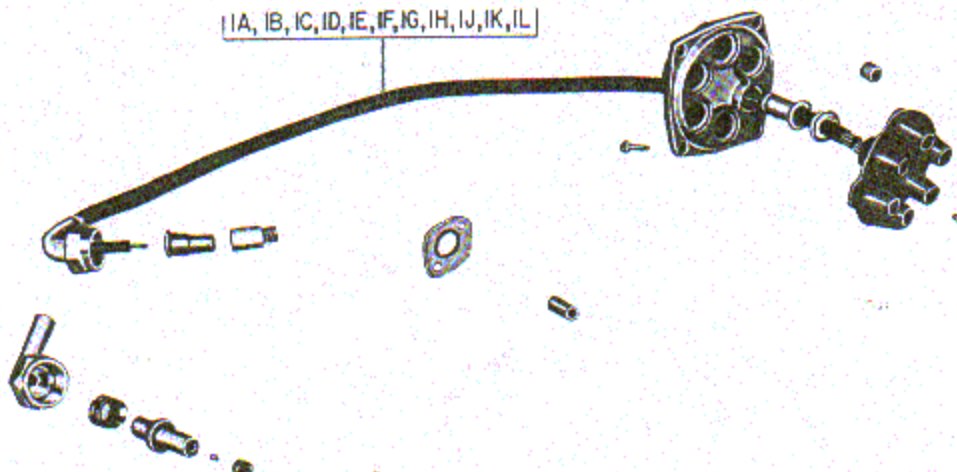
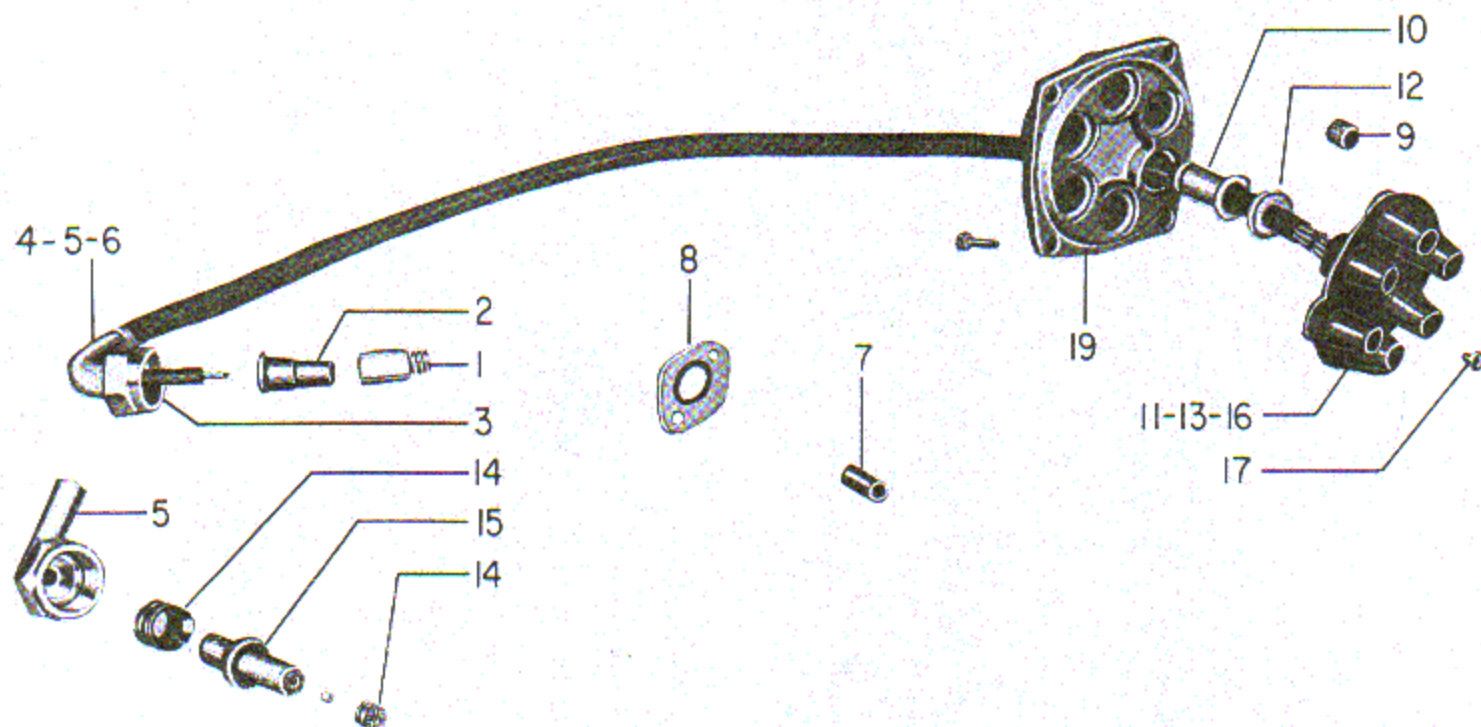


Figure 20

IGNITION COMPONENTS
IGNITION HARNESS AND IGNITION HARNESS LEAD ASSEMBLIES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	B1C5	C1B5	CAB5	C4C5	DA45	EA5	EB5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	JA45	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	
1	71489	PLUG, Grommet	12	12	12	12	12	12	12	12	12	12	12	12	12	12		12	12		12			12		12	
2	76755	COLLAR (Silicone)	12	12	12	12	12	12	12	12	12	12	12	12	12	12		12	12		12			12		12	
3	76757	NUT, 5/8-24	12	12	12	12	12	12	12	12	12	12	12	12	12	12		12	12		12			12		12	
4	LW-10389	ELBOW, 70°				12	12	12	12															12		12	
	LW-10389	ELBOW, 70°,bottom	6	6	6					6		6										6					
5	LW-10388	ELBOW, 110°,top	6	6	6					6		6										6					
6	LW-10390	ELBOW, 90°,top										6	6	6	6			6	6							6	
	LW-10388	ELBOW, 110°,bottom										6	6	6	6			6	6							6	
	LW-11118	ELBOW ASSEMBLY, 90°,top											6	6	6	6							6				
	LW-11117	ELBOW ASSEMBLY, 110°,bottom											6	6	6	6							6				
7	76753	SLEEVING, Ring plastic	6	6	6	6	6	6	6	6	6	6										6			6	6	
8	76828	PLATE, Spark plug cable,ign.thru.baffle	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2
9	LW-10400	FERRULE, Braid retaining	24	24	24	24	24	24	24	24	24	24	24	24	24	24		24	24		24			24		24	24
10	76728	SLEEVE, Alum.shield term.braid																									
		confining	12	12	12	12	12	12	12	12	12	12	12	12	12	12		12	12		12			12		12	12
11	76983	GROMMET, Magneto	2	2	2	2	2	2	2	2	2	2	2								2			2		2	2
12	LW-11123	SPACER, Magneto grommet											12	12	12	12		12	12							12	
13	76750	GROMMET, Mag.outlet,distributor											2	2	2	2		2	2								2
14	72250	SPRING ASSY.,Ignition high altitude												12	12	12	12						12				
15	LW-10701	GROMMET, Spark plug elbow,high																									
		altitude												12	12	12	12						12				
16	LW-11120	GROMMET, Distributor													2	2	2	2					2				
17	73245	EYELET	12	12	12	12	12	12	12	12	12	12	12	12	12	12		12			12	12		12		12	12
18	75941	TAPE, Ignition identification	1	1	1	1	1	1	1	1	1	1	1	1	1	1		1	1		1	1		1	1	1	1
19	76982	MAGNETO PLATE	2	2	2	2	2	2	2	2	2	2	2	2	2	2		2	2		2	2		2	2	2	2


Figure 21

IGNITION COMPONENTS

IGNITION HARNESS ATTACHING PARTS

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	
1	72453	CLAMP, 1-3/4 in.ID with 11/32 dia. offset					6	6	6	6															6	6	
2	73751	CLAMP, Rubber dip,3-wire	2	4	4	2	2	2	2	4		2	3	3	3	3	3		3	3		2	3		2	2	
3	71824	CLAMP, Rubber dip,2-wire	2	4	4					4		2	4	4	4	4	4		4	4		2	4			2	
4	68604	CLAMP, Rubber dip,1-wire	2	2	2					2		2	2	2	2	2	4		2	2		2	4			2	
5	LW-12199	CLIP, 7/8 in.ID for no.10 screw										1	1	1	1	1		1	1		1					1	
	73751	CLAMP, Rubber dip,3-wire																								5	
6	72351	SCREW, Self-locking,no.10-32	8	8	8	8	8	8	8	8	8									8				8		8	
7	STD-553	SCREW, Rd.hd.,no.6-32 x 1/2 in.long				6	6	6	6														6			6	
8	STD-1925	SCREW, 1/4-20 x 11/16 in.long	2	6	6					6	11	2		4	4	4	4				2	4	12				
9	STD-1874	SCREW, Fill.hd.,self-locking,1/4-20 x 7/8 long												6	6	6	6	6				6				5	
10	STD-692	SCREW, Rd.hd.,no.10-32 x 1/2 in.long										2	2	2	2	2	2		2	2		2				4	
11	STD-696	WASHER, Thin,1/4 in.plain																								un	
12	STD-8	WASHER, Plain,1/4 in.	4	10	10					10		4	6	6	6	6			6	6	4	4				10	
13	STD-160	WASHER, Internal lock,1/4 in.	6	10	10					10		6	2	2	2	2			2	2	4	6				5	
	STD-8	WASHER, Plain,1/4 in.											12	12	12	12						12					
	STD-160	WASHER, Internal lock,1/4 in.											10	10	10	10						10					
14	STD-2029	BOLT, Hex.hd.,1/4-20 NC-3 x 1-1/8 in. long										2	2	2	2	2		2	2								
15	AN365-632C	NUT, Self-locking,no.6-32				6	6	6	6														6			6	
16	STD-1411	NUT, Plain,1/4-20	4	4	4					4		4								4	4						
17	MS25082-6	NUT, Thin,3/8-24																				2					
18	STD-670	NUT, Self-locking,no.10-32										2	2	2	2	2		2	2			2				4	
19	40239	PROTECTOR, Ignition cable	6	6	6	6	6	6	6	6	6	6	6	6	6		6	6	6	6	6		6		6		
	77156	PROTECTOR, Ignition cable										6	6	6	6	6		6	6		6	6		6			
20	76734	ZIP STRAPS										10	10	10	10			10	10			2				11	
	76734	ZIP STRAPS											8	8	8	8											
21	72815	BRACKET, Twist										2	2	2	2	2		2	2		2					4	

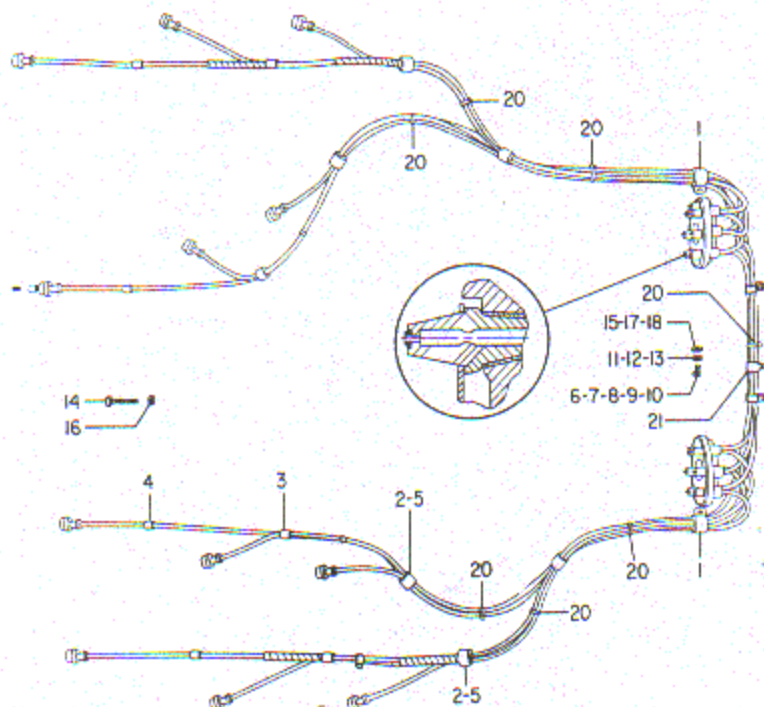


Figure 22

IGNITION COMPONENTS

SPARK PLUG

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	B1C5	C1B5	CAB5	CAC5	DA5	EA5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	JAA5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	
1	1182-B3	SPARK PLUG (Champion REM-40E)					12	12	12	12																12	
	1182-J3	SPARK PLUG (Champion REM-38E)		12	12	12					12	12	12	12	12	12			12	12		12					
	1182-D4	SPARK PLUG (Champion RHM-38E)		12									12								12						
	1182-Y3*	SPARK PLUG (Champion RHB-36P)										12	12	12	12	12	12			12	12						
	1182-N4**	SPARK PLUG (Champion REB-37E)																12								12	
	1182-K4†	SPARK PLUG (Champion RHB-36W)																								12	
	1182-W5\$	SPARK PLUG (Champion RHB-37E)																						12	12		

* - Long reach, platinum.

** - Long reach.

† - Long reach, iridium.

\$ - Massive electrode, long reach and all weather.

NOTE

See latest edition of Avco Lycoming Service Instruction No. 1042 for alternate and optional spark plug information.

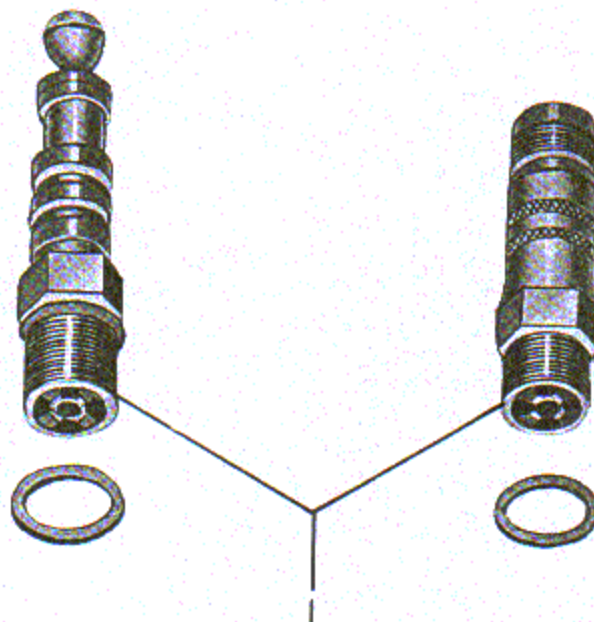


Figure 23

IGNITION COMPONENTS VOLTAGE REGULATORS AND RELAYS

		VOLTAGE REGULATORS AND RELAYS																				ON ALL	
PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																					
		A1A5	B1A5	C1B5	D4B5	E4A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5
71745*	REGULATOR, Voltage (12V.-50Amp.)			1		1											1						
72077**	REGULATOR, Voltage (12V.-50Amp.)	1							1								1						
68872+	REGULATOR, Voltage (24V.-25Amp.)				1																		
73340†	REGULATOR, Voltage (24V.-50Amp.)								1	1													
72696\$	REGULATOR, Voltage (24V.-50Amp.)	1	1	1				1	1														
71979&	REGULATOR, Voltage (24V.-40Amp.)	1																					
74292*+	REGULATOR, Voltage (24V. full transistor)									1	1	1	1										
74291*†	REGULATOR, Voltage (12V. full transistor)				1	1									1								
LW-10185*\$	REGULATOR, Voltage (12V. full transistor)				1	1	1	1			1		1	1	1	1	1			1			
LW-10179*&	REGULATOR, Voltage (24V. full transistor)							1	1	1	1	1	1			1	1	1	1			1	
68628++	RELAY, 12 volt	1						1		1	1	1	1	1			1	1	1	1			1
71349+†	RELAY, 24 volt	1	1	1				1		1													
74804+\$	RELAY, Overvoltage, 24 volt									1	1	1	1										
74661+&	RELAY, Overvoltage, 12 volt					1	1								1								
78059††	RELAY, Overvoltage, 12 volt				1	1	1	1							1	1	1						
78060†\$	RELAY, Overvoltage, 24 volt							1		1	1		1				1	1	1			1	

* - 12V.-50Amp. regulator, non-parallel. Delco-Remy P/N 1119224.
 ** - 12V.-50Amp. regulator, paralleling system. Delco-Remy P/N 1119246.
 + - 24V.-25Amp. regulator, non-parallel. Delco-Remy P/N 1118799.
 † - 24V.-50Amp. regulator non-parallel. Delco-Remy P/N not available.
 \$ - 24V.-50Amp. regulator, paralleling system. Delco-Remy P/N 1119656. No relay.
 & - 24V.-40Amp. regulator, paralleling system. Delco-Remy P/N 1119237.

*+ - 24 volt, full transistor regulator for 24 volt-50 amp alternator. Delco-Remy P/N 9000591.
 †† - 12 volt, full transistor regulator for 12V.-70Amp. alternator. Delco-Remy P/N 9000590.
 *\$ - 12 volt, full transistor regulator. Use with Prestolite alternators. Prestolite P/N VSF-7203.
 *& - 24 volt, full transistor regulator. Use with Prestolite alternators. Prestolite P/N VSF-7403.

++ - 12 volt relay, paralleling system. Delco-Remy P/N 1116887. 1 required each pair of engines.
 +† - 24 volt relay, Delco-Remy P/N 1116902. 1 required each pair of engines.
 +\$ - Use with 24V.-50Amp. alternator Delco-Remy P/N 1115832.
 +& - Use with 12V.-70Amp. alternator Delco-Remy P/N 1115831.
 †† - Use with Prestolite regulators. Prestolite P/N X-17621, 12V.
 †\$ - Use with Prestolite regulators. Prestolite P/N X-17620, 24V.

IGNITION COMPONENTS
GENERATOR AND ALTERNATOR DRIVE BELTS

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C1B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
1	60886*	BELT, Generator drive				1	1		1																		
	72270**	BELT, Generator drive		1								1							1	1							
	76026+	BELT, Alternator drive (3/8 in.wide)	1				1	1	1		1	1	1	1	1	1	1	1	1	1	1	1					
	72000\$	BELT, Generator drive	1	1	1					1	1	1															
	74519†	BELT, Alternator drive (3/8 in.wide)										1						1		1			1		1		
	LW-10092*+	BELT, Alternator drive (3/8 in.wide)				1	1		1									1					1		1		
	LW-10971*†	BELT, Alternator dual idler pulley take-up (Two matched belts)									1																

* - 1.91:1 drive belt for generators with less than 24V.-40Amp.

** - 2.40:1 drive belt for generators with less than 24V.-40Amp.

+ - 3.25:1 drive belt.

\$ - 2.50:1 drive belt for generators with 24V.-40Amp. and higher.

† - 3.25:1 drive belt for alternators with idler pulley.

*+ - 3.25:1 drive belt. Belt is used with special alternator link and bracket (Piper installations).

*† - Dual alternator drive belt, idler pulley take-up.

**ELECTRICAL SYSTEM
GENERATOR AND ALTERNATOR ASSEMBLY**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																				ON ALL		
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	M1A5		N1A5	P1A5
1	71744*	GENERATOR (12V.-50Amp)	1			1	1		1		1								1						
	71980**	GENERATOR (24V.-50Amp)	1								1														
	72695+	GENERATOR (24V.-50Amp)	1	1	1					1	1	1													
2	75220†	ALTERNATOR ASSEMBLY, 24V-50Amp					1				1	1	1	1			1								
3	74863	PULLEY, Alternator					1	1			1	1	1	1			1						1		
4	74878	FAN AND BAFFLE ASSEMBLY					1	1			1	1	1	1			1						1		
	74880\$	ALTERNATOR ASSEMBLY, 12V-70Amp					1	1									1								
	75646†	ALTERNATOR ASSEMBLY, 24V-50Amp										1											1		
	78308&	ALTERNATOR (12V.-40Amp)										1													
	78312**	ALTERNATOR (24V.-50Amp)	1						1		1	1	1	1					1	1	1			1	
	78314*†	ALTERNATOR (24V.-70Amp)					1				1		1				1						1		
	78309&	ALTERNATOR (12V.-40Amp)																1							
	78311*\$	ALTERNATOR (12V.-70Amp)					1	1								1		1							
	78313*+	ALTERNATOR (24V.-50Amp)									1	1							1	1	1				
	78315*†	ALTERNATOR (24V.-70Amp)											1						1						
	78310*\$	ALTERNATOR (12V.-70Amp)					1	1	1	1								1	1	1				1	1
	78407*&	ALTERNATOR (12V.-60Amp)										1				1	1					1			

* - Delco-Remy P/N 1101915.

** - Delco-Remy P/N 1105052.

+ - Delco-Remy P/N 1105055.

† - Delco-Remy P/N 1100718. 3.25:1 ratio.

\$ - Delco-Remy P/N 1100717. 3.25:1 ratio.

& - Prestolite P/N ALE-8406. Externally grounded, 3.25:1 ratio.

*+ - Prestolite P/N ALT-8404. Externally grounded, 3.25:1 ratio.

*† - Prestolite P/N ALU-8403. Externally grounded, 3.25:1 ratio.

*\$ - Prestolite P/N ALX-8403. Externally grounded, 3.25:1 ratio.

*& - Prestolite P/N ALY-8403. Externally grounded, 3.25:1 ratio.

NOTE

Avco Lycoming does not supply alternators with thermocouples.

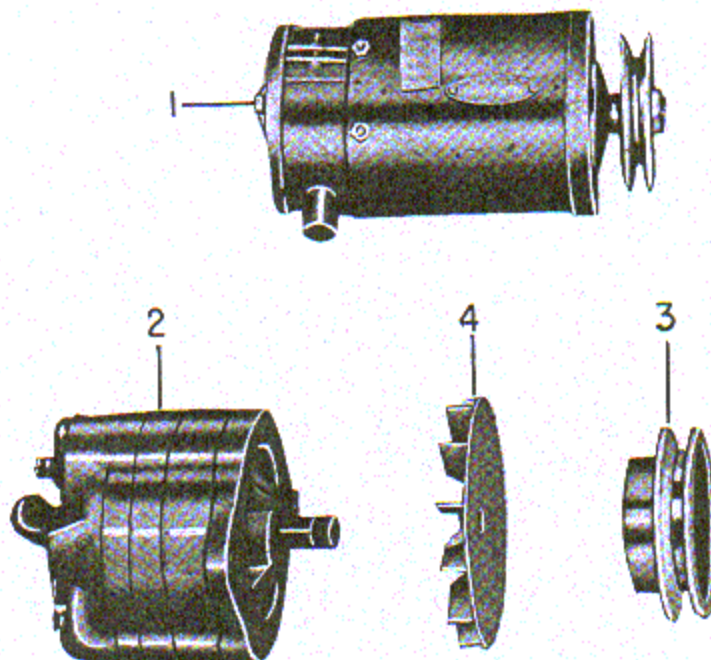


Figure 24

**ELECTRICAL SYSTEM
GENERATOR MOUNTING AND ATTACHING PARTS**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	
1	70419*	BRACKET GENERATOR	2	2	2	2	2		2	2	2	2								2							
		BRACKET ATTACHING PARTS																									
2	STD-1838	BOLT, Hex.hd.,5/16-18 x 15/16 in.long	4	4	4	4	4		4	4	4	4								4							
3	73383	LOCKPLATE, 5/16 in.bolt x 1.00 spacing	2	2	2	2	2		2	2	2	2								2							
4	76028	LINK, Generator adjusting	1	1	1	1	1		1	1	1	1								1							
		LINK ATTACHING PARTS																									
5	STD-35	WASHER, Plain,5/16 in.	1	1	1	1	1		1	1	1	1								1							
6	STD-1817	BOLT, Hex.hd.,drilled,5/16-18 x 3/4 in. long	1	1	1	1	1		1	1	1	1								1							
7	STD-1851	BOLT, Drilled end,5/16-18 x 1-5/32 in. long	2	2	2	2	2		2	2	2	2								2							
8	STD-35	WASHER, Plain,5/16 in.	un	un	un	un	un		un	un	un	un								un							
9	STD-1420	NUT, Slotted,5/16-18	2	2	2	2	2		2	2	2	2								2							
10	STD-68	PIN, Cotter	2	2	2	2	2		2	2	2	2								2							
11	STD-1727	WASHER, 3/4 OD x 11/32 ID x 1/8 in. thick	1	1	1	1	1		1	1	1	1								1							
12	STD-1817	BOLT, Hex.hd.,drilled,5/16-18 x 3/4 in. long	1	1	1	1	1		1	1	1	1								1							

* - Aero installations are shipped with bracket and link plus the attaching parts, but less generator and attaching parts.

NOTE

Engine models listed above were shipped from the factory with generator mounting bracket as listed.

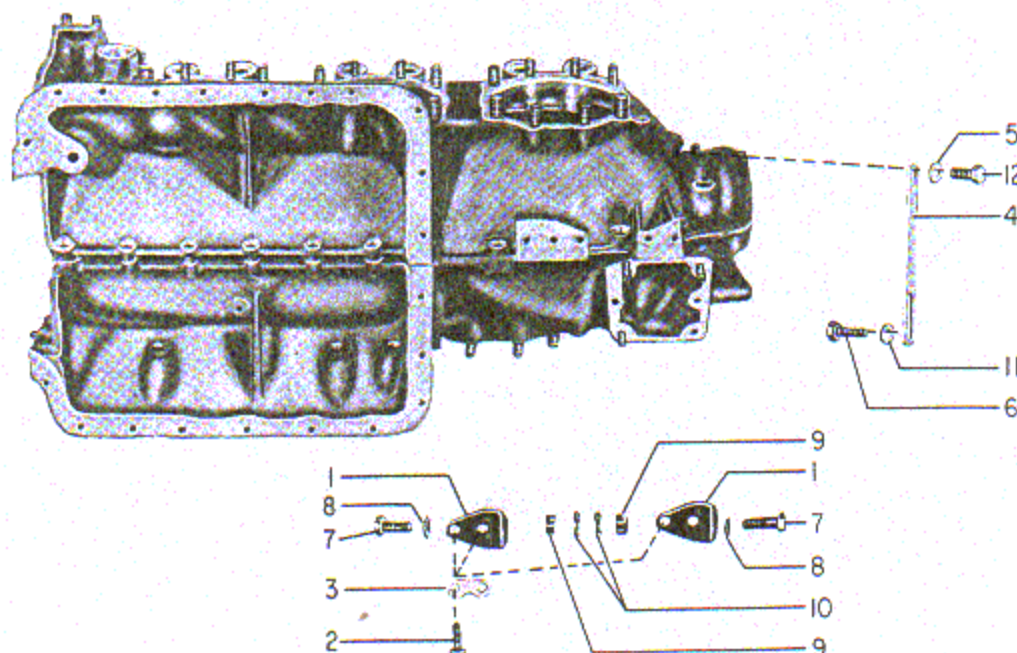


Figure 25

ELECTRICAL SYSTEM
ALTERNATOR MOUNTING AND ATTACHING PARTS

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																					ON ALL	
			A1A5	B1A5	B1C5	C1B5	C1C5	D1A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	J1A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5		P1A5
1	76533*	BRACKET, Alternator	1				1	1	1		1	1	1	1	1	1	1	1	1	1	1				
2	77756**	BRACKET, Alternator					1	1	1				1				1	1	1	1	1		1	1	1
3	LW-11147†	BRACKET, Alternator belt,adjusting									1						1	1	1				1	1	1
4	74324\$	BRACKET, Alternator						1	1			1	1	1			1					1			
5	73383	LOCKPLATE, 5/16 in.bolt x 1.00 spacing																							
			1				1	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1
6	STD-1838	BOLT, Hex.hd.,5/16-18 x 15/16 in.long	2				2	2	2	2		2	2	2	2	2	2	2	2	2	2	2	2	2	2
7	STD-1727	WASHER, Plain,3/4 OD x 11/32 ID x 1/8 in. thick										1	1					1	1			1	1		
8	STD-1889	BOLT, Hex.hd.,drilled,5/16-18 x 1-7/32 in. long										1	1					1	1			1	1		
9	75380	LINK, Alternator adjusting	1					1	1	1			1	1	1	1	1	1	1	1	1				
10	77757**	BRACKET, Alternator belt,adjusting											1					1	1			1	1		
11	LW-10091+	LINK, Alternator adjusting						1	1	1							1						1	1	
12	74325	LINK, Alternator adjusting							1	1			1	1	1		1								
13	74518	BRACKET, Alternator belt adjusting											1									1			
14	STD-35	WASHER, Plain,5/16 in.	1				1	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1
15	STD-1817	BOLT, Hex.hd.,drilled,5/16-18 x 3/4 in. long	1				1	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1
16	STD-1727	WASHER, Plain,3/4 OD x 11/32 ID x 1/8 in.thick	1				1	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1
17	STD-1817	BOLT, Hex.hd.,drilled,5/16-18 x 3/4 in. long	1				1	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1
18	74323	STRUT, Alternator support	1					1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1
19	78639**	PULLEY AND SHAFT ASSY., Alternator belt, adjusting																							
20	LW-10578†	PULLEY AND SHAFT ASSY., Alternator dual belt,adjusting											1					1	1			1	1		
21	78614	PULLEY, Alternator belt adjusting											1												
22	78420	PULLEY, Alternator idler,dual										1						1	1			1	1		
23	78629	BEARING, Ball,alternator idler pulley											1	1					1	1		1	1		
24	MS16625-1125	RING, Int.retaining,1-1/8 in.dia.										2	2					2	2			2	2		
25	78617	IDLER, Shaft, alternator belt adjusting												1											
26	LW-10576	SHAFT, Alternator dual belt, idler																1	1			1	1		
27	76768	LOCKWASHER, Alternator idler pulley bearing											1	1					1	1		1	1		
28	76769	LOCKNUT, Alternator idler pulley bearing											1	1					1	1		1	1		
29	STD-669&	WASHER, 33/64 ID x 1.00 in.OD x 1/8 in. thick (Not Illustrated)											1	1					1	1		1	1		
30	STD-676&	NUT, Self-locking,1/2-20 x .608 in. thick (Not Illustrated)											1	1					1	1		1	1		

* - Alternator bracket and alternator attaching parts, Prestolite.

** - Alternator bracket, alternator attaching parts with idler pulley belt adjustment. Prestolite 12V.-70Amp., 24V.-70Amp., installations.

† - Alternator adjusting link, special fiber installations.

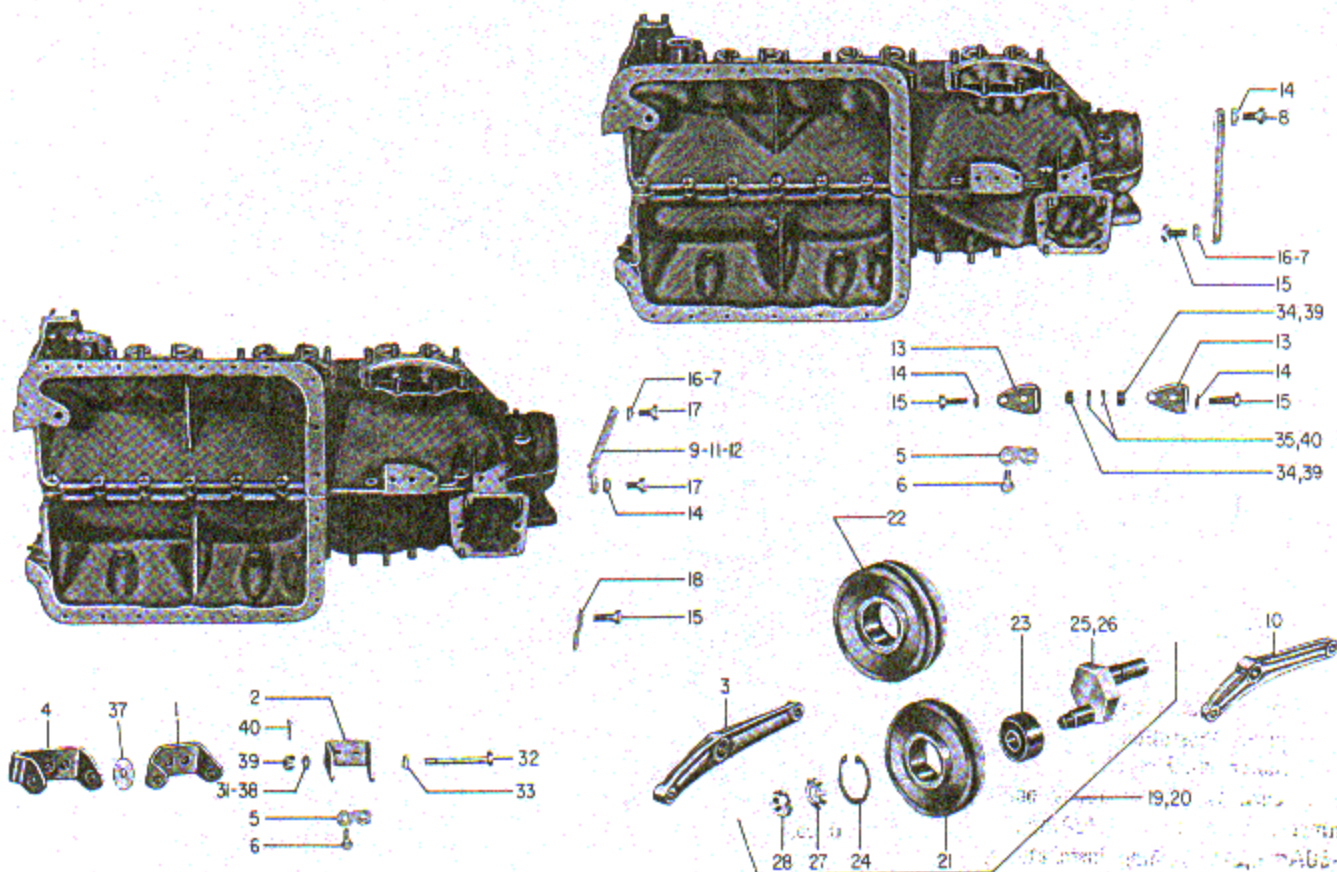
† - Alternator belt adjusting bracket, idler pulley less alternator mounting bracket and alternator attaching parts. 24V.-70Amp., 24V.-100Amp., for dual belt drive.

\$ - Alternator bracket, alternator attaching parts and idler pulley belt adjustment for engine models IO-540-G1B5 and -M1A5. (For idler pulley adjustment only.)

& - Not illustrated.

**ELECTRICAL SYSTEM
ALTERNATOR MOUNTING AND ATTACHING PARTS**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL							
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5		K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5
31	STD-33	WASHER, Plain,3/8 in.	un																							
32	AN6-14	BOLT, Hex.hd,dr.end,3/8-24 x 1-37/64																								
		in. long	1				1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
	AN6-12	BOLT, Hex.hd,dr.end,3/8-24 x 1-21/64																								
		in. long					1	1		1			1				1	1		1			1	1	1	1
	AN6-32	BOLT, Hex.hd,dr.end,3/8-24 x 3-21/64																								
		in. long						1		1			1	1	1	1		1					1			
33	STD-33	WASHER, Plain,3/8 in.	un																							
34	STD-872	NUT, Slotted,3/8-24	1				1	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
35	STD-713	PIN, Cotter,3/32 in.dia.x 3/4 in.long	1				1	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
36	AN6-13	BOLT, Hex.hd,drilled end,3/8-24 x																								
		1-29/64 long											1			1	1		1			1				
	AN6-16	BOLT, Hex.hd,dr.end,3/8-24 x 1-53/64																								
		in. long	1				1	1	1	1		1	1		1	1	1	1	1	1	1		1	1	1	1
37	76534	SHIM, 1-1/8 OD x 13/32 ID x 0.005																								
		in. thick	un																							
38	STD-33	WASHER, Plain,3/8 in.	un																							
39	STD-872	NUT, Slotted,3/8-24	1				1	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
40	STD-713	PIN, Cotter,3/32 in.dia.x 3/4 in.long	1				1	1	1	1		1	1	1	1	1	1	1	1	1	1	1	1	1	1	1
	STD-1727	WASHER, Plain,3/4 OD x 11/32 ID x																								
		1/8 in.thick												1									1			
	STD-1889	BOLT, Hex.hd,drilled,5/16-18 x 1-7/32																								
		in. long												1									1			


Figure 26

**ELECTRICAL SYSTEM
STARTING MOTOR AND ATTACHING PARTS**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL							
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	J4A5	K1A5		K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5
1	76211*	STARTER, 12Volt, 12/14 pitch pinion	1				1	1	1	1			1	1			1	1	1	1	1		1		1	
	76212**	STARTER, 24Volt, 12/14 pitch pinion	1	1	1		1				1	1	1	1	1	1		1		1	1	1		1		1
		STARTER ATTACHING PARTS																								
2	STD-35	WASHER, Plain,5/16 in.																								4
3	STD-475	WASHER, Internal lock,5/16 in.																								4
4	STD-1323	BOLT, Hex.hd.,5/16-18 x 1-5/32 in.long																								1
5	STD-1410	NUT, Plain,5/16-18																								3
6	LW-12083+	SWITCH, Magnetic						1	1							1			1	1						
	76775†	SWITCH, Magnetic	1									1	1	1	1	1			1	1		1				
	76776\$	SWITCH, Magnetic											1												1	

* - 12Volt starter, 3.38:1 internal reduction. Prestolite P/N MZ-4206.
** - 24Volt starter, 3.38:1 internal reduction. Prestolite P/N MHB-4001.

+ - 12Volt switch. Prestolite P/N SAZ-4201E-1.

† - 24Volt switch. Prestolite P/N SAW-4411-1.
\$ - 24Volt switch, externally grounded, Prestolite P/N SAW-4412-1.

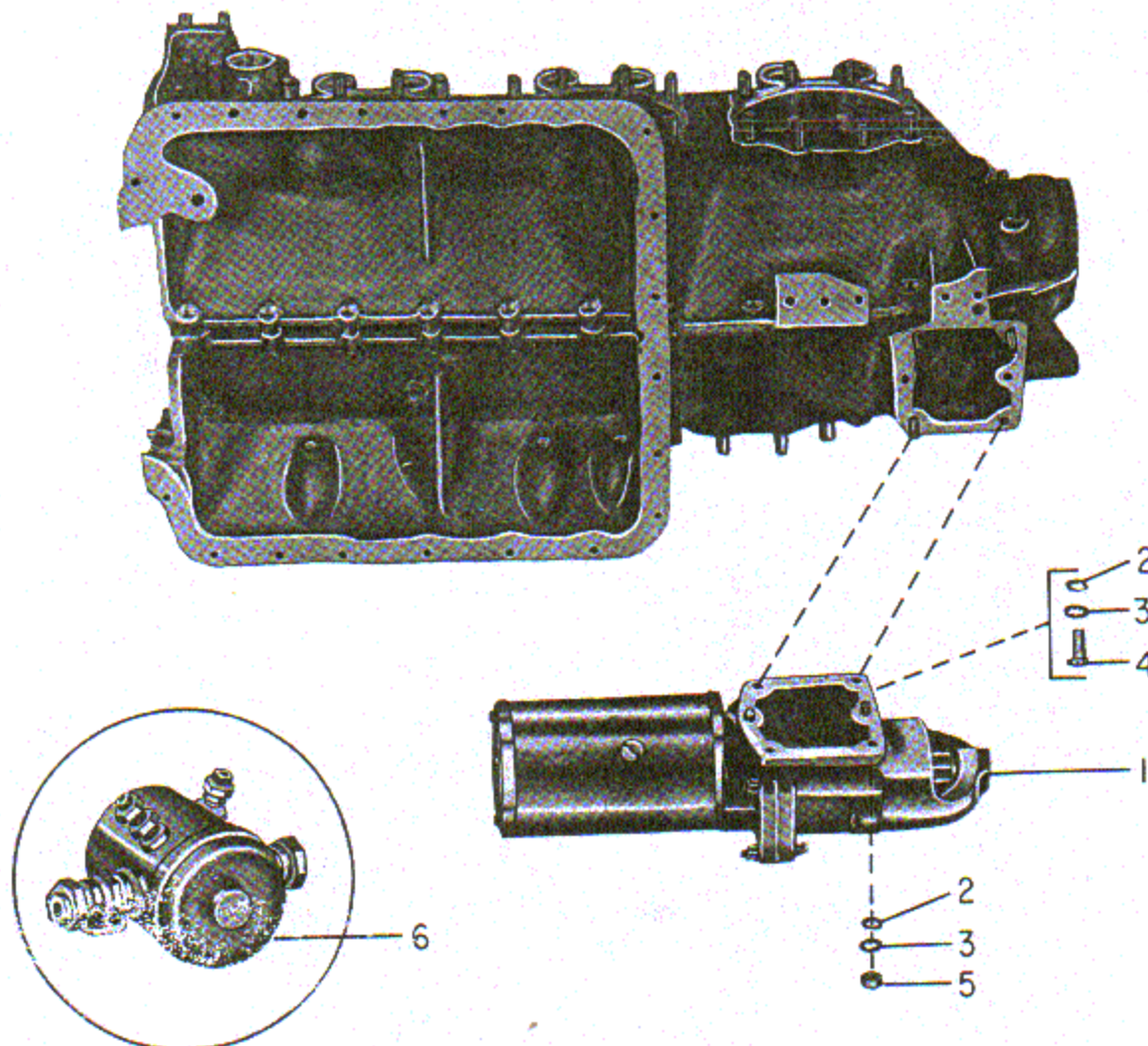


Figure 27
5-5

**OIL SUMP AND INDUCTION SYSTEM
OIL SUMP ASSEMBLY AND OIL SUCTION SCREEN**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5		
1	72812	GASKET, Oil sump				1	1	1	1								1							1	1		
2	72056	SUMP ASSEMBLY, Oil				1	1	1	1								1							1			
	78590*	SUMP ASSEMBLY, Oil															1								1		
3	71699	CONNECTION, Intake pipe				6	6	6	6								6						6	6			
4	69943	STUD, 1/4-20 x 1-3/8 in.long				14	14	14	14								14						14				
	69943*	STUD, 1/4-20 x 1-3/8 in.long															12							12			
	25C-14*	STUD, 1/4-20 x 1-3/4 in.long															2							2			
5	68437	STUD, 5/16-18 x 1-7/8 in.long				4	4	4	4								4						4	4			
6	38-15	STUD, 3/8-16 x 1-7/8 in.long				8	8	8	8								8						8				
	38-15*	STUD, 3/8-16 x 1-7/8 in.long															4							4			
	38-16*	STUD, 3/8-16 x 2.00 in.long															4							4			
7	STD-1173	INSERT, Heli-coil,1/4-20 x 1/2 long				4	4	4	4								4						4	4			
OIL SUMP ATTACHING PARTS																											
8	STD-8	WASHER, Plain,1/4 in.				34	34	34	34								34						34	34			
9	STD-160	WASHER, Internal lock,1/4 in.				27	27	27	27								27						27	27			
10	STD-1419	BOLT, Hex,hd.,1/4-20 x 1-1/8 in.long				7	7	7	7								7						7	7			
11	STD-1688	BOLT, Hex,hd.,1/4-20 x 1.00 in.long				6	6	6	6								6						6	6			
12	STD-1411	NUT, Plain,1/4-20				21	21	21	21								21						21	21			
13	STD-551	PLUG, Sq.hd.,drilled,1/2-14 NPT				2	2	2									2							2			
	AN932-5	PLUG, Allen hd.,1/2-14 NPT				2		2															2				
14	70484	SCREEN, Oil suction				1	1	1	1								1						1	1			
15	STD-111	GASKET, 1.00 ID x 1-1/4 OD x 3/32 thick				1	1	1	1								1						1	1			
16	69335	PLUG, Hex,hd.,5/8 in.x 1.00-20 thd.				1	1	1	1								1						1	1			
17	61548	PLATE, Name				1	1	1	1								1						1	1			
NAME PLATE ATTACHING PARTS																											
18	STD-1901	DRIVE STUD, Rd.hd.,no.4 x 3/16 in. long				4	4	4	4								4						4	4			
	72812	GASKET, Oil sump	1	1	1					1	1	1	1	1	1	1	1	1	1	1	1	1	1	1			
19	74833**	HOUSING ASSEMBLY, Oil sump and induction	1	1	1					1	1	1	1	1	1	1	1	1	1	1	1	1	1				
	LW-10454+	HOUSING ASSEMBLY, Oil sump and induction																						1			
20	STD-514	DOWEL, 5/16 in.dia.x 1/2 in.long	2	2	2					2	2	2	2	2	2	2	2	2	2	2	2	2	2	2			
21	72179	STUD, Intake pipe extension	3	3	3					3	3	3	3	3	3	3	3	3	3	3	3	3	3	3			
22	72167	PIPE, Extension intake,cyl.no.1 and 2	2	2	2					2	2	2	2	2	2	2	2	2	2	2	2	2	2	2			
23	72168	PIPE, Extension intake,cyl.no.3 and 4	2	2	2					2	2	2	2	2	2	2	2	2	2	2	2	2	2	2			
24	72169	PIPE, Extension intake,cyl.no.5 and 6	2	2	2					2	2	2	2	2	2	2	2	2	2	2	2	2	2	2			
25	LW-11273	CLAMP, Intake pipe extension	3	3	3					3	3	3	3	3	3	3	3	3	3	3	3	3	3	3			
26	25-9	STUD, 1/4-20 x 1-1/8 in.long	4	4	4					4	4	4	4	4	4	4	4	4	4	4	4	4	4	4			
27	69542	STUD, 1/4-20 x 1-3/8 in.long	15	15	15					15	15	15	15	15	15	15	15	15	15	15	15	15	15	15			
28	38-15	STUD, 3/8-16 x 1-7/8 in.long	8	8	8					8	8	8	8	8	8	8	8	8	8	8	8	8	8	8			
	38-17+	STUD, 3/8-16 x 2-1/8 in.long																					8				

* - IO-540-J4A5 special (Piper installation).

** - Tuned sump with fuel drains.

+ - Tuned sump with fuel drains and long mounting studs.

OIL SUMP AND INDUCTION SYSTEM
OIL SUMP ASSEMBLY AND OIL SUCTION SCREEN

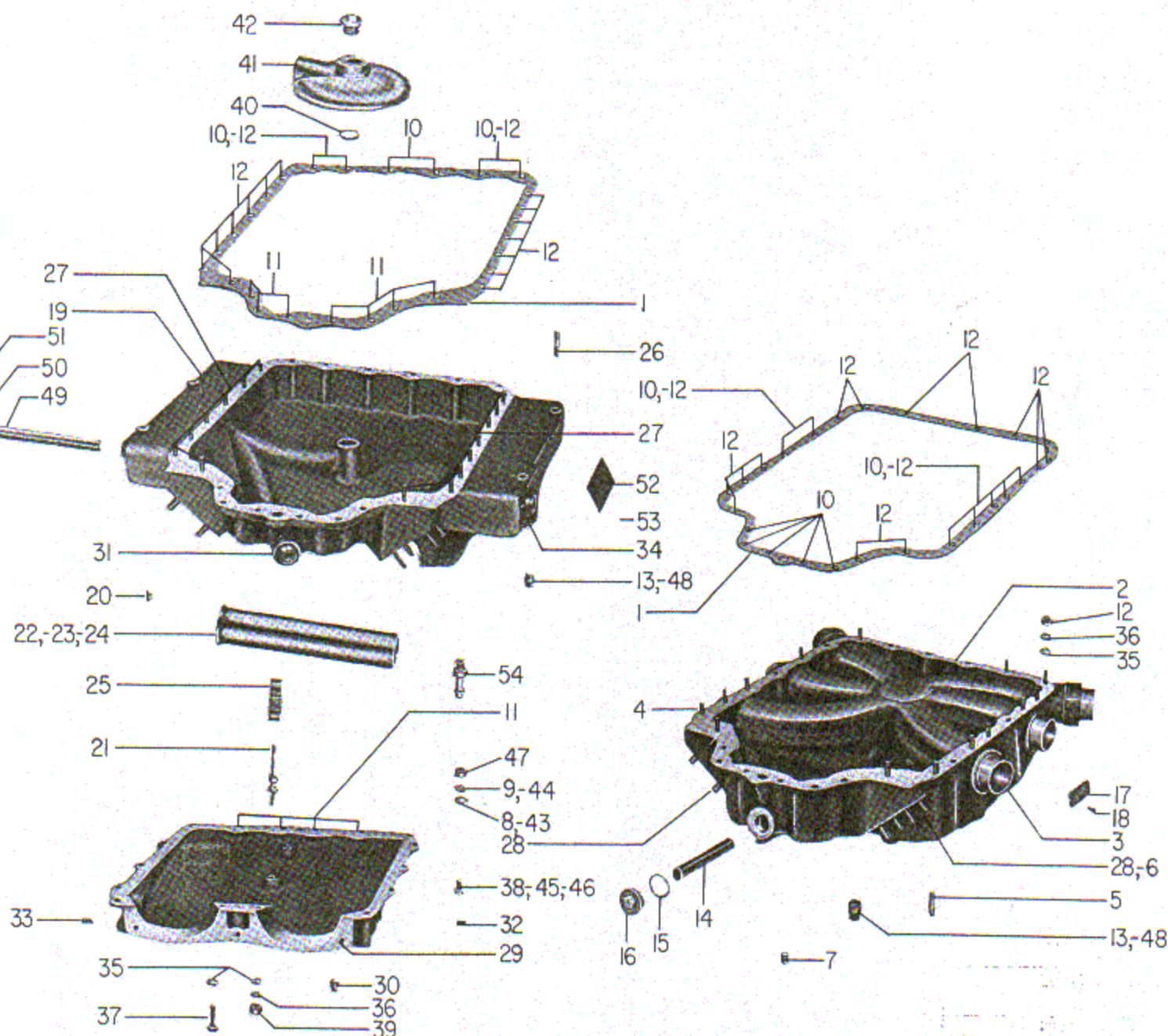


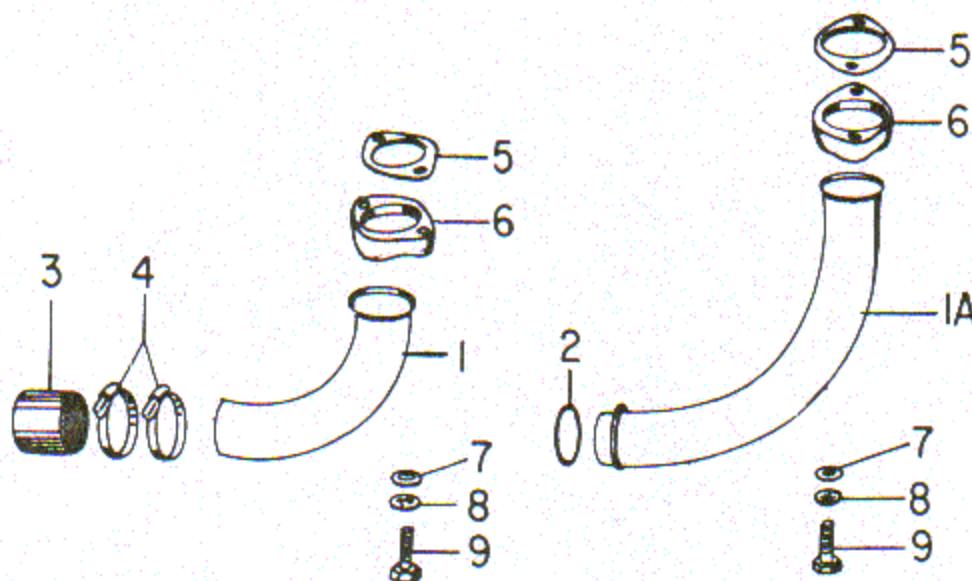
Figure 28

OIL SUMP AND INDUCTION SYSTEM
OIL SUMP ASSEMBLY AND OIL SUCTION SCREEN

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL		
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5			
29	72706	INSERT, Heli-coil, self-locking, 1/4-20 x 3/8 in. long	14	14	14							14	14	14	14	14	14	14	14	14	14	14	14	14	14	14	14		
30	STD-405	PLUG, Sq. hd., drilled, 1/8 NPT	2	2	2							2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	
31	STD-91	PLUG, Allen hd., 1/2-14 NPT	1	1	1							1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
32	1102	PLUG, Allen hd., 1/8-27 NPT	2	2	2							2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	
33	STD-784	PLUG, Allen hd., 3/8-18 NPT	1	1	1							1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
34	STD-355	PLUG, Allen hd., 3/4-14 NPT	2	2	2							2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	
35	STD-8	WASHER, Plain, 1/4 in.	29	29	29							29	29	29	29	29	29	29	29	29	29	29	29	29	29	29	29	29	
36	STD-160	WASHER, Internal lock, 1/4 in.	23	23	23							23	23	23	23	23	23	23	23	23	23	23	23	23	23	23	23	23	
37	STD-1646	BOLT, Hex. hd., 1/4-20 x 2.00 long	2	2	2							2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	
38	STD-1688	BOLT, Hex. hd., 1/4-20 x 1.00 long	14	14	14							14	14	14	14	14	14	14	14	14	14	14	14	14	14	14	14	14	
39	STD-1411	NUT, Plain, 1/4-20	13	13	13							13	13	13	13	13	13	13	13	13	13	13	13	13	13	13	13	13	
40	STD-589	GASKET, Annular, 1-1/8 OD x 29/32 ID x 1/16	1	1	1							1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
41	72958	BAFFLE, Oil sump	1	1	1							1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
42	72960	PLUG, 5/8 in. hex. hd. x 5/8 in.	1	1	1							1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
		HOUSING ASSY., ATTACHING PARTS																											
43	STD-8	WASHER, Plain, 1/4 in.	37	37	37							37	37	37	37	37	37	37	37	37	37	37	37	37	37	37	37	37	
44	STD-160	WASHER, Internal lock, 1/4 in.	23	23	23							23	23	23	23	23	23	23	23	23	23	23	23	23	23	23	23	23	
45	STD-1419	BOLT, Hex. hd., 1/4-20 x 1-1/8 in. long	6	6	6							6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	
46	STD-1688	BOLT, Hex. hd., 1/4-20 x 1.00 in. long	8	8	8							8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	8	
47	STD-1411	NUT, Plain, 1/4-20	25	25	25							25	25	25	25	25	25	25	25	25	25	25	25	25	25	25	25	25	
48	STD-551	PLUG, Sq. hd., drilled, 1/2-14 NPT	2	2	2							2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	
49	60422	SCREEN, Oil suction	1	1	1							1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
50	STD-111	GASKET, 1.00 ID x 1-1/4 OD x 3/32 in. thick	1	1	1							1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
51	69335	PLUG, 5/8 in. hex. hd., x 1.00-20 thd.	1	1	1							1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
52	61548	PLATE, Name	1	1	1							1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
		NAME PLATE ATTACHING PARTS																											
53	STD-1901	DRIVE STUD, Rd. hd., no. 4 x 3/16 in. long	4	4	4							4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	
54	75444	ADAPTER ASSEMBLY, Fuel drain valve													2					2	2	2	2					2	

OIL SUMP AND INDUCTION SYSTEM
INTAKE PIPE ASSEMBLIES

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																ON ALL
			A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	J4A5	K1A5	
1	70485	PIPE, Intake					6	6	6	6								6	
1A	LW-12191	PIPE, Intake,cyl.no.1		1	1	1					1	1	1	1	1	1	1	1	
	LW-12192	PIPE, Intake,cyl.no.2		1	1	1					1	1	1	1	1	1	1	1	
	LW-12193	PIPE, Intake,cyl.no.3		1	1	1					1	1	1	1	1	1	1	1	
	LW-12194	PIPE, Intake,cyl.no.4 and 5		2	2	2					2	2	2	2	2	2	2	2	
	LW-12195	PIPE, Intake,cyl.no.6		1	1	1					1	1	1	1	1	1	1	1	
2	72711	RING, Seal,intake pipes		6	6	6					6	6	6	6	6	6	6	6	
3	69603	HOSE, 1-3/4 in.ID x 2-3/16 in.OD x 1-3/4 in.long						6	6	6								6	
4	STD-1269	CLAMP, Hose,1-7/8 to 2-1/4 in.ID x 9/16 in.wide						12	12	12								12	
5	71973	GASKET, Two bolt flange,1-7/8 in.ID																	6
6	73346	FLANGE, Intake pipe,upper						6	6	6								6	
	74360	FLANGE, Intake pipe,upper		6	6	6					6	6	6	6	6	6	6	6	
INTAKE PIPE ATTACHING PARTS																			
7	STD-8	WASHER, Plain,1/4 in.																	12
8	STD-160	WASHER, Internal lock,1/4 in.																	12
9	STD-1215	BOLT, Hex.hd.,1/4-20 x 1-1/4 in.long																	12


Figure 29

OIL SUMP AND INDUCTION SYSTEM
AIR INLET HOUSING ASSEMBLY

AIR INLET HOUSING ASSEMBLY			QUANTITY PER ASSEMBLY																ON ALL							
FIG. REF.	PART NUMBER	DESCRIPTION	A1A5	B1A5	B1C5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5
1	72210	GASKET, Air throttle housing	1	1	1					1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	
2	73031	HOUSING ASSEMBLY, Air inlet	1	1	1					1	1	1					1	1		1	1		1			1
2A	LW-10456*	HOUSING ASSEMBLY, Air inlet																								1
2B	78100	HOUSING ASSEMBLY, Air inlet											1						1							
2C	77653	HOUSING ASSEMBLY, Air inlet											1		1				1	1	1	1				
2D	77998	HOUSING ASSEMBLY, Air inlet																						1		
3	68316	STUD, 5/16-18 x 1-11/16 in.long	4	4	4					4	4	4		4		4	4		4	4	4		4			
	67556	STUD, 5/16-18 x 2.00 in.long											4		4				4	4	4	4				4
4	1102	PLUG, Allen head,1/8 in.pipe												1					1							1
5	STD-1353	INSERT, Heli-coil,no.10-24 x 3/8 long												2					2							
	STD-1164	INSERT, Heli-coil,5/16-18 x 5/8 long																						4		
		INLET HOUSING ATTACHING PARTS																								
6	STD-8	WASHER, Plain,1/4 in.	6	6	6					6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6
7	STD-1875	BOLT, Hex.hd.,1/4-20 x 12/16 in,long	4	4	4					4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4
8	STD-1890	BOLT, Hex.hd.,dr.hd.,1/4-20 x 13/16 in. long	2	2	2					2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2

* - Air inlet housing with manifold pressure trap.

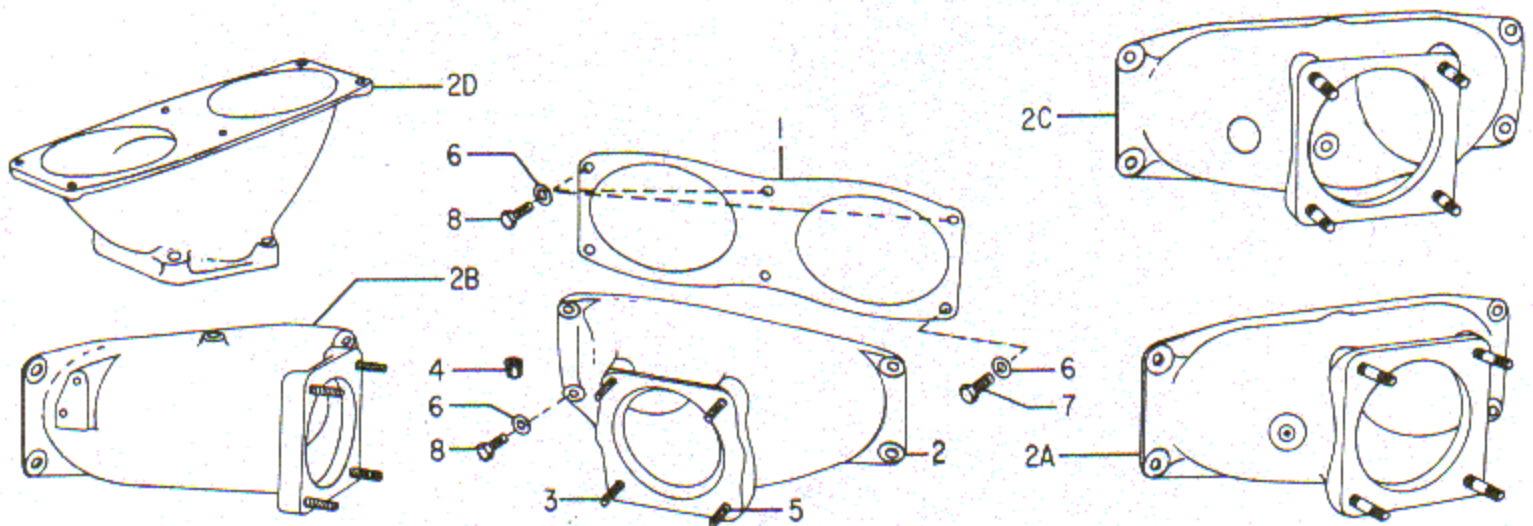


Figure 30

**OIL SUMP AND INDUCTION SYSTEM
FUEL INJECTOR AND RELATED PARTS**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
1	73032	GASKET, Air inlet housing	1	1	1					1	1	1	1	1	1	1	1	1	1	1	1	1	1	1	1		
2	66224	GASKET, Fuel injector				1	1	1	1								1								1	1	
	73032	GASKET, Air inlet housing										2	2	2	2		2	2	2	2	2				2		
3	73024	INJECTOR, Fuel,Bendix P/N 391787-2			1	1				1	1										1						
	73967	INJECTOR, Fuel,Bendix P/N 391821-2	1									1	1			1					1						
	LW-11746*	INJECTOR, Fuel,Bendix P/N 2524534-1												1													
	75567	INJECTOR, Fuel,Bendix P/N 2524273-2												1					1	1							
	LW-11924**	INJECTOR, Fuel,Bendix P/N 2524556-1																		1							
	73937	INJECTOR, Fuel,Bendix P/N 2524054-2					1	1		1	1																
	75176	INJECTOR, Fuel,Bendix P/N 2524213-2						1	1									1									
	77003	INJECTOR, Fuel,Bendix P/N 2524298-2											1		1				1	1							
	77293	INJECTOR, Fuel,Bendix P/N 2524311-1																					1				
	79008	INJECTOR, Fuel,Bendix P/N 2524420-1											1								1					1	
	LW-11007	INJECTOR, Fuel,Bendix P/N 2524477-2											1												1	1	
	LW-10622	INJECTOR, Fuel,Bendix P/N 2524459-2																									
	LW-10976+	INJECTOR, Fuel,Bendix P/N 2524470-1															1	1					1				
	LW-11218	INJECTOR, Fuel,Bendix P/N 2524491-1											1													1	
	LW-11220	INJECTOR, Fuel,Bendix P/N 2524492-1																					1				
	79034†	INJECTOR, Fuel,Bendix P/N 2524422-1																					1			1	
4	77654	SPACER, Fuel injector											1		1				1	1	1	1				1	
5	AN822-4	ELBOW, 1/4 in.flared tube and 1/8 NPT, 90°											1				1	1					1				
	76304\$	ELBOW, Adjustable -4 to -6.45°												1					1	1							
6	MS19512-6&	SEAL, Oil,5/64 in.dia.section x 15/32 in. ID												1		1				1	1	1	1	1	1	1	
														1		1				1	1	1	1			1	
7	AN919-6&	REDUCER, Flared tube (1/4 in.tubing)																									
8	AN825-4	TEE, 1/4 in.flared tube x 1/8 in.pipe thd.																							1		
																									1		
9	AN924-6&	NUT, Flared tube,bulkhead fitting																							1		
10	76779&	ADAPTER, Injector,fuel outlet																							1		
11	LW-11867&	ELBOW, 1/8 in.pipe thd.int.and ext. 90°																							1		
																									1		
12	76364	ELBOW AND BUSHING ASSY., 45°																									
13	AN929-3	CAP ASSEMBLY, 3/16 in.flared tube fitting																							1		
		FUEL INJECTOR ATTACHING PARTS																									
14	STD-35	WASHER, Plain,5/16 in.																								4	
15	STD-1410	NUT, Plain,5/16-18																								4	
16	STD-1763	LOCKNUT, Plain,5/16 in.																								4	
17	STD-475	WASHER, Internal lock,5/16 in.																						4			
18	STD-1828	BOLT, Hex.hd.,5/16-18 x 1-5/16 in.long																						4			
19	73028	MANIFOLD ASSY., Fuel,Bendix P/N 391806-3																									
	75283	MANIFOLD ASSY., Fuel,Bendix P/N 2524223-1																									
			1																							1	
							1	1	1	1				1	1		1	1	1	1	1	1	1	1	1	1	

* - Same as P/N 75567 but with a
shortened throttle lever.

** - Injector for Britten-Norman

installations.

+ - Bellanca installation.

† - Bullet type, no vent return, fuel
injector.

& - Assemble in fuel injector.

\$ - Assemble in fuel injector outlet.

**OIL SUMP AND INDUCTION SYSTEM
FUEL INJECTOR AND RELATED PARTS**

FUEL INJECTOR AND RELATED PARTS

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	B1C5	C1B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
	75573	MANIFOLD ASSY., Fuel,Bendix P/N 2524240-1													1				1	1							
	79007	MANIFOLD ASSY., Fuel,Bendix P/N 2524421												1						1	1						
	74620	MANIFOLD ASSY., Fuel,Bendix P/N 2524178-1																		1	1				1		
	78923*+	MANIFOLD ASSY., Fuel,Bendix P/N 2524416-1				1					1	1															
20	74151	NOZZLE, Fuel injection (P/N 2524107-1)	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6		6	6	6	6	6	6	6		
	LW-10475*†	NOZZLE ASSEMBLY, Air bleed (P/N 2524370-1)												6				6	6						6	6	
	951391	PACKING, Preformed											2					2	2						2	2	
21	73021	BRACKET, Fuel manifold			1	1					1	1															
	73965	BRACKET, Fuel manifold	2				2	2	2	2			2	2		2	2	2	2	2	2	2	2	2	2	2	
	74326	BRACKET, Fuel manifold													1				1	1							
	75414	BRACKET, Fuel manifold																						2			
22	73966	SPACER, Fuel manifold bracket	2				2	2	2	2			2	2		2	2	2	2	2	2	2	2	2	2	2	
		BRACKET ATTACHING PARTS																									
23	STD-251	WASHER, Internal lock,no.10																									
24	STD-82	SCREW, Fill.hd.dr.,no.10-24 x 1/2 in. long																								4	
25	STD-160	WASHER, Internal lock,1/4 in.				2								1					1	1				2		4	
26	STD-1897	BOLT, Hex.hd.,1/4-28 x 17/64 in.long												1													
27	STD-1499	BOLT, Hex.hd.,1/4-20 x 1/2 in.long																	1	1							
28	STD-1411	NUT, Plain,1/4-20																									
29	76778	MANIFOLD ASSEMBLY, Fuel,right																									
30	76777	MANIFOLD ASSEMBLY, Fuel,left																									
31	STD-460	BOLT, Hex.hd.,1/4-20 x 3/4 in.long																									
32	STD-8	WASHER, Plain,1/4 in.																									
33	STD-160	WASHER, Internal lock,1/4 in.																									
34	STD-1411	NUT, Plain,1/4-20																									
*+ - Fuel manifold with -3 fitting at																											

*+ - Fuel manifold with -3 fitting at nozzle pressure gage.

*† - Sealed, vented injection nozzle for turbocharging.

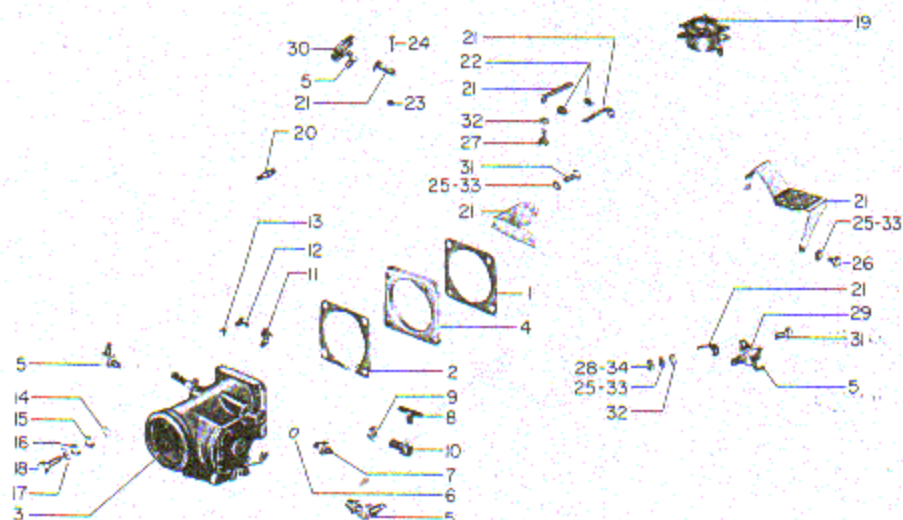


Figure 31

OIL SUMP AND INDUCTION SYSTEM
FUEL LINE TUBE AND HOSE ATTACHING PARTS

FUEL LINE TUBE AND HOSE ATTACHING PARTS																									ON ALL
FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																						
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	J4A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5
1	61581-20A	TUBE ASSY., Fuel manifold to nozzle no. 5			1	1					1	1													
1A	61581-24A	TUBE ASSY., Fuel manifold to nozzle no. 2			1	1					1	1													
1B	61581-17A	TUBE ASSY., Fuel manifold to nozzles no. 1 and no. 4			2	2					2	2													
1C	61581-21A	TUBE ASSY., Fuel manifold to nozzle no. 3			1	1					1	1													
1D	61581-22A	TUBE ASSY., Fuel manifold to nozzle no. 6			1	1					1	1													
2	LW-12098-1-200*	TUBE ASSY., Fuel manifold to nozzles no. 1-2-5-6	4				4	4	4	4			4	4		4	4	4	4	4	4	4	4	4	4
2A	LW-12098-1-170*	TUBE ASSY., Fuel manifold to nozzles no. 3-4	2				2	2	2	2			2	2		2	2	2	2	2	2	2	2	2	2
	LW-12098-1-200	TUBE ASSY., Fuel manifold to nozzle, cyl. no.1											1					1	1						
2B	LW-12098-2-276	TUBE ASSY., Fuel manifold to nozzle, cyl. no.2											1					1	1						
2C	LW-12098-1-134	TUBE ASSY., Fuel manifold to nozzle, cyls. no.3-5											2					2	2						
2D	LW-12098-1-210	TUBE ASSY., Fuel manifold to nozzle, cyls. no.4-6											2					2	2						
2E	LW-12098-0-100	TUBE ASSY., Fuel manifold to nozzle, cyls. no.1-3-4-6																					4		
	LW-12098-1-170	TUBE ASSY., Fuel manifold to nozzle, cyls. no.2-5																					2		
3	77369	TUBE ASSY., Fuel pump to injector											1		1				1	1				1	
	LW-10445	TUBE ASSY., Fuel pump to injector											1						1						
	LW-11925**	TUBE ASSY., Fuel pump to injector																							
4	75203	HOSE ASSY., Metering valve to fuel manifold			1	1					1	1	1		1				1	1					
	73151	HOSE ASSY., Fuel injector to fuel manifold			1	1					1	1													
	73970	HOSE ASSY., Fuel injector fo fuel manifold			1							1				1	1			1	1				
	73974	HOSE ASSY., Fuel injector to fuel manifold					1	1	1	1								1							
	74532	HOSE ASSY., Fuel injector to fuel manifold											1						1	1					
	75431	HOSE, Fuel injector to fuel manifold, right																					1		
	75429	HOSE, Fuel injector to fuel manifold, left																					1		
	79018	HOSE ASSY., Fuel injector to fuel manifold										1							1	1				1	
	LW-10642	HOSE ASSY., Fuel injector to fuel manifold																					1	1	
5	74222	HOSE ASSY., Fuel pump to injector					1	1							1				1	1					
	73320	HOSE ASSY., Fuel pump to injector																					1		
	75433	HOSE ASSY., Fuel pump to injector																							

** - Britten-Norman installation.

* - "AN" fuel pump drive.

OIL SUMP AND INDUCTION SYSTEM

FUEL LINE TUBE AND HOSE ATTACHING PARTS

NOTE NO. 1

IO-540-D4A5, -J4A5 model engines are shipped without fuel line from fuel pump to injector.

NOTE NO. 2

10-540-N1A5, -R1A5 model engines are shipped without fuel line from fuel pump to injector and use a 35-1/4 in. hose from fuel injector to fuel manifold.

NOTE NO. 3

Some models of 10-540-G1B5 engines were shipped less fuel pump and line to injector (Bendix RSA10ED1 set-up). Has fuel inlet and outlet fittings (Ted Smith installation). 10-540-P1A5 has fuel pump inlet and outlet fittings.

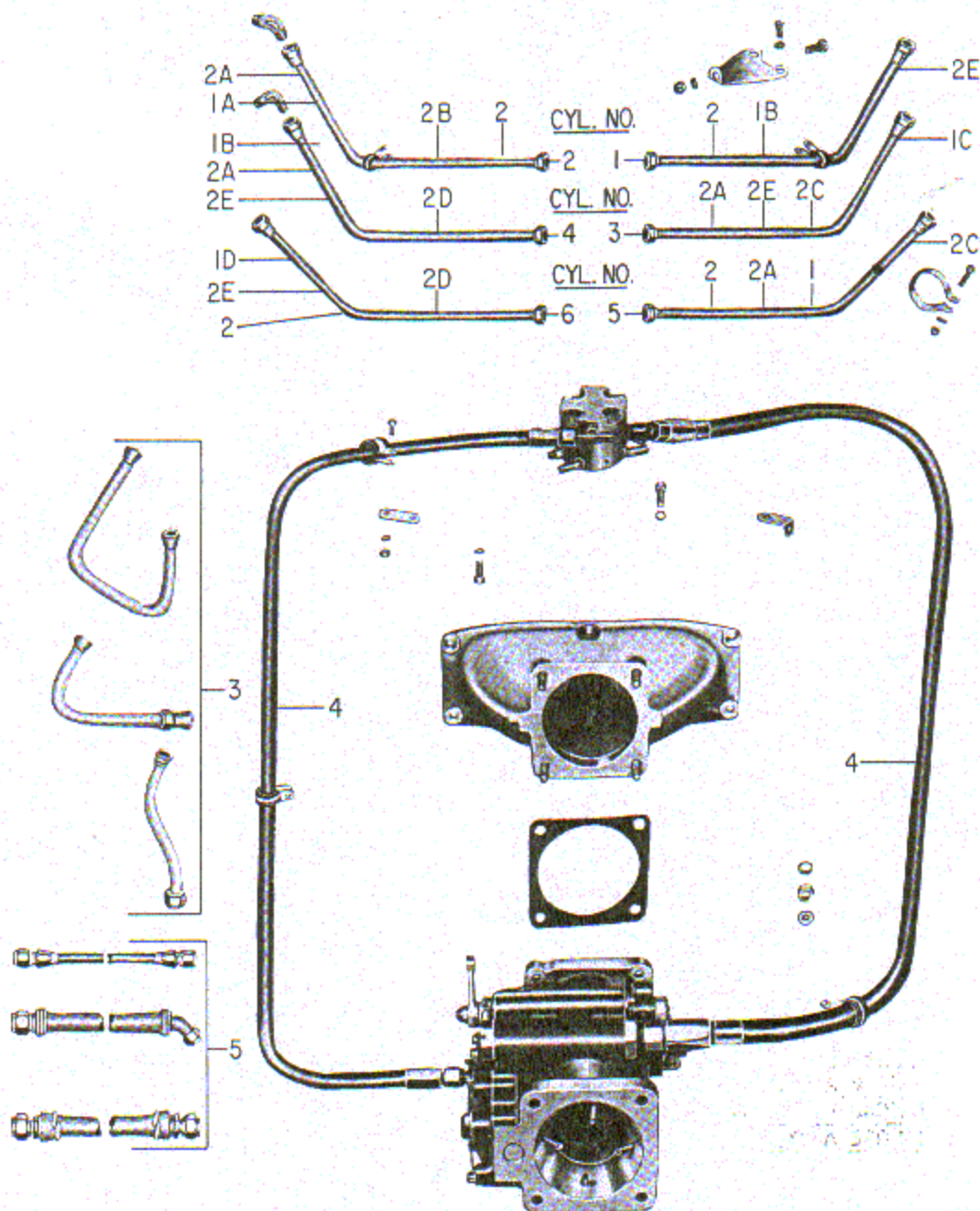


Figure 32

**OIL SUMP AND INDUCTION SYSTEM
FUEL LINE TUBES AND FUEL HOSE ASSEMBLIES**

FIG. REF.	PART NUMBER	DESCRIPTION	QUANTITY PER ASSEMBLY																								ON ALL
			A1A5	B1A5	C1B5	C4B5	C4C5	D4A5	E1A5	E1B5	G1A5	G1B5	G1C5	G1D5	G1E5	G1F5	J1A5	K1A5	K1B5	K1C5	K1D5	K1E5	M1A5	N1A5	P1A5	R1A5	
1	76735	BRACKET, 90°			2	2					2	2															
2	73152	BRACKET, Support clamp	1	1	1						1	1	1	1	1	1	1		1	1	1	1	1	1	1		
3	73136	BRACKET, 90°			2	2	2	2		2	2	2	4	4	4	4		2	4	4	4	4		1	4	4	
	74278	BRACKET ASSEMBLY, Fuel line support					1	1	1	1							1							1	1		
4	74149	BRACKET, Fuel line support					1	1	1	1							1							1	1		
5	STD-1891	CLINCH NUT, Self-locking,no.10-32					2	2	2	2							2							2	2		
	73136	BRACKET, Extension angle, 90°																						1	1		
6	73650	CLIP, Cushion type,1/4 ID for 1/4 dia. screw			6	14	14	6	6	6	6	14	14	6	6	6	6	6	6	6	6	6	6	6	6	6	
	73050	CLIP, 3/4 ID for 1/4 in.dia.screw			2	2					2	2												6	6	6	
	LW-12516	CLIP, 1/16 ID for no.10 screw	6	2	2	6	6	6	6	2	2	6	6	4	6	6	6	6	4	4	6	6	6		6	6	
	LW-12293	CLIP, 1/16 ID for 1/4 in.screw			2	2					2	2															
	72036	CLIP, 3/4 ID for 3/16 in.dia.screw	6			6	6	6	6			6	6	2	6	6	6	6	2	2	6	6	6	6	6	6	
	LW-12202	CLIP, 3/4 ID for no.10 screw	4			6	6	6	6			4	4	8	4	4	4	6	8	8	4	4	4		4	4	
7	73971	CLIP, Cushion type,1/2 ID with .26 dia. hole	2			1	1	1	1			2		1	2	2	2	1	1	2	2	2	2	1	1		
	73751	CLIP, Cushion type,5/8 ID for 1/4 dia. screw												2					2	2			2	2			
	73971	CLIP, Cushion type,1/2 ID with .26 dia. hole																	1				1	1			
	LW-12202	CLIP, 3/4 ID for no.10 screw																	10								
	LW-12516	CLIP, 1/16 ID for no.10 screw																	12								
8	AN735-26	CLAMP, Loop type,1-5/8 in.dia.		4	4						4	4															
	62255	CLAMP, Cushion type,7/16 ID for 1/4 dia. screw			1	1					1	1															
	MS21919-F7	CLAMP, 7/16 ID for no.10 screw			1	1					1	1															
	73843	CLAMP, Fuel injection line												2				2	2								
9	MS21919-DF4	CLAMP, Cushion type,1/4 ID for no.10 screw																						1			
	MS21919-DF4	CLAMP, Cushion type,1/4 ID for no.10 screw																						1			
10	STD-425	WASHER, Plain,no.10	2	8	8	2	2	2	2	8	8	2	2	2	2	2	2	2	2	2	2	2	2	2	2	2	
11	STD-860	SCREW, Fill.hd.,no.10-32 x 5/8 in.long	14	10	10	14	14	14	14	10	10	14	14	13	14	14	14	14	13	13	14	14	14	14	14	14	
12	STD-670	NUT, Self-locking,no.10-32	14	10	10	14	14	14	14	10	10	14	14	13	14	14	14	14	13	13	14	14	14	14	14	14	
	STD-425	WASHER, Plain,no.10	1		3	3	3	3				1	1	1	1	1	3		1	1	1	1		3	3		
	STD-860	SCREW, Fill.hd.,no.10-32 x 5/8 in.long	1		1	1	1	1				1	1	1	1	1	1		1	1	1	1	1	1	1		
	STD-670	NUT, Self-locking,no.10-32	1		1	1	1	1				1	1	1	1	1	1		1	1	1	1	1	1	1		
	STD-692	SCREW, Rd.hd.,no.10-32 x 1/2 in.long			2	2	2	2									2							2	2		
	STD-425	WASHER, Plain,no.10																	2					1	1		
	STD-860	SCREW, Fill.hd.,no.10-32 x 5/8 in.long																	14				1	1			
	STD-670	NUT, Self-locking,no.10-32																	14				1	1			
13	STD-8	WASHER, Plain,1/4 in.																					2				
14	STD-160	WASHER, Internal lock,1/4 in.																					2				
15	STD-1411	NUT, Plain,1/4-20																					2				
16	74070	ELBOW, Adjustable,3/8 tubing,45°			1	1																					
	STD-1112*	ELBOW, 3/8 tubing,1/4 NPT x 45°												1				1	1								
17	AN822-6**	ELBOW, 3/8 tubing,1/4 NPT x 90°												1	1				1	1	1		1	1			
	77433	ELBOW, 1/2 tubing,1/4 NPT x 90°																					1				
	LW-10446+	ELBOW, 3/8 tubing,90° swivel											1							1				1			
	AN822-6†	ELBOW, 3/8 tubing,1/4 NPT x 90°											2											2			

* - Assemble in fuel pump outlet.

** - Assemble in fuel pump.

+ - Assemble in fuel injector inlet.

† - Assemble in fuel pump outlets.

OIL SUMP AND INDUCTION SYSTEM FUEL LINE TUBES AND FUEL HOSE ASSEMBLIES

NOTE NO. 1

On IO-540-G1B5, -P1A5 (Ted Smith installations) an additional AN822-6 elbow is assembled in fuel pump inlet with fitting end 5° - 15° down from horizontal centerline.

NOTE NO. 3

IO-540-M1A5 model engines use figure ref. numbers 3-9-11-12. They are assembled on fuel line for no.2 cyl. at the front bolt used to attach intake pipe to cylinder head.

NOTE NO. 2

IO-540-M1A5 model engines use figure ref. numbers 2-9-11-12. They are assembled on fuel line for no.5 cyl. at rear stud on top of oil sump and induction housing.

NOTE NO. 4

IO-540-N1A5, -R1A5 model engines use figure ref. numbers 3-7-10-11-12. They are assembled to attach fuel injector to fuel manifold line to sump at bolt immediately behind no.3 intake pipe on sump.

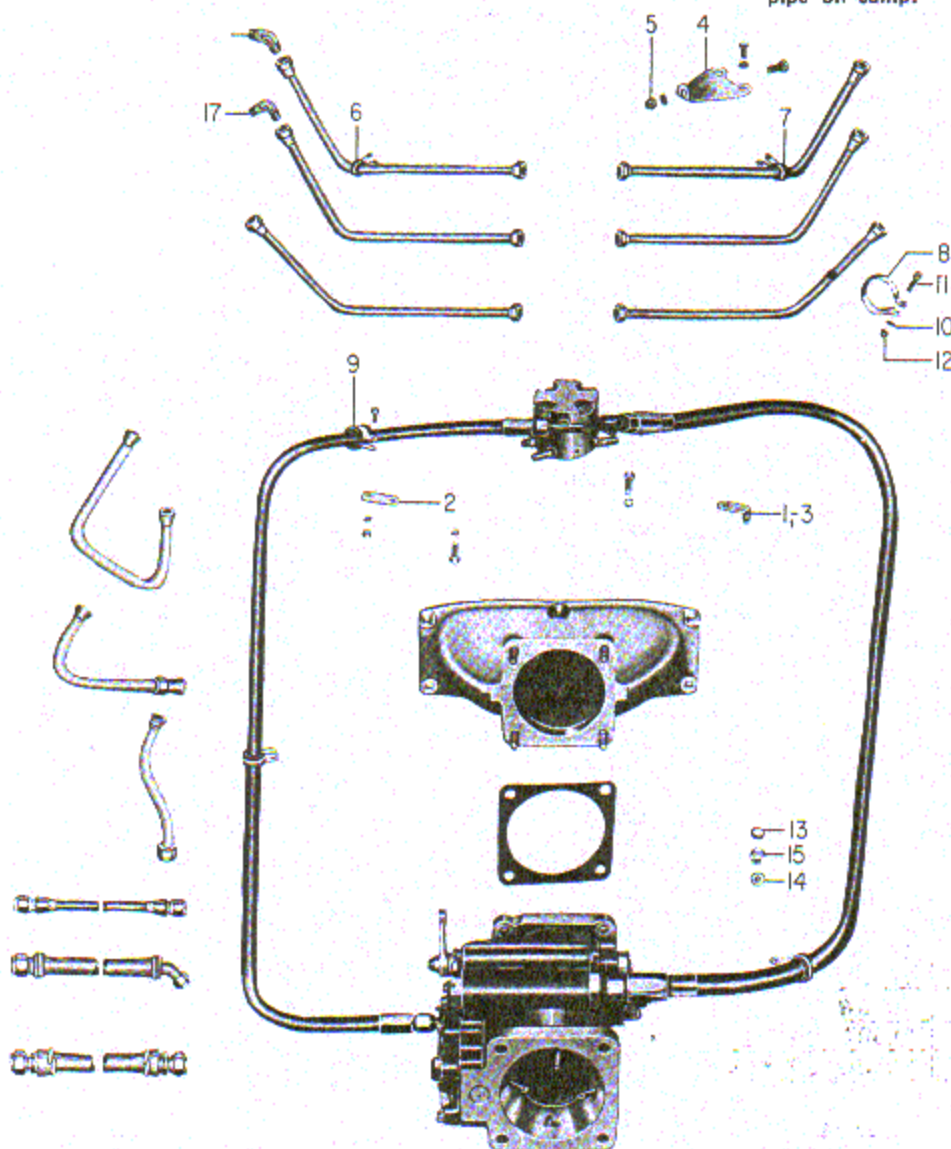


Figure 33

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PART NO.	PART NAME	PAGE NO.	PART NO.	PART NAME	PAGE NO.
AN6-12	Bolt	5-4	38-17	Stud	1-1
AN6-13	Bolt	5-4	38-17	Stud	6-1
AN6-14	Bolt	5-4	38-22	Stud	1-1
AN6-16	Bolt	5-4	50-15	Stud	1-1
AN6-32	Bolt	5-4	STD-8	Washer	1-9
AN310-6	Nut	1-3	STD-8	Washer	1-9
AN365-632C	Nut	4-6	STD-8	Washer	2-1
AN520-10-8	Screw	3-9	STD-8	Washer	2-3
AN735-26	Clamp	6-10	STD-8	Washer	2-3
AN816-8	Nipple	2-8	STD-8	Washer	2-5
AN822-4	Elbow	6-6	STD-8	Washer	2-7
AN822-6	Elbow	6-10	STD-8	Washer	2-7
AN822-8	Elbow	2-7	STD-8	Washer	4-6
AN823-6D	Elbow	3-2	STD-8	Washer	6-1
AN823-8	Elbow	2-7	STD-8	Washer	6-3
AN823-8D	Elbow	2-7	STD-8	Washer	6-4
AN825-4	Tee	6-6	STD-8	Washer	6-5
AN844-16D	Elbow	2-8	STD-8	Washer	6-7
AN919-6	Reducer	6-6	STD-8	Washer	6-10
AN924-6	Nut	6-6	STD-33	Washer	1-3
AN929-3	Cap	6-6	STD-33	Washer	1-4
AN931-12S17	Grommet	3-9	STD-33	Washer	1-9
AN932-5	Plug	6-1	STD-33	Washer	2-6
AN4045-1	Gasket	2-3	STD-33	Washer	5-4
AN4045-1	Gasket	2-5	STD-35	Washer	1-7
MS9048-100	Pin	1-3	STD-35	Washer	2-1
MS13997-3	Key	3-4	STD-35	Washer	2-5
MS13998-3	Cap	3-4	STD-35	Washer	2-5
MS16625-1081	Ring	1-8	STD-35	Washer	2-6
MS16625-1125	Ring	5-3	STD-35	Washer	3-7
MS19512-6	Seal	6-6	STD-35	Washer	5-2
MS21919-F7	Clamp	6-10	STD-35	Washer	5-3
MS21919-DF4	Clamp	6-10	STD-35	Washer	5-5
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25C-8	Stud	3-2	STD-82	Screw	6-7
25C-10	Stud	2-7	STD-91	Plug	6-3
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25C-21	Stud	2-1	STD-111	Gasket	6-3
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31C-10	Stud	3-2	STD-160	Lockwasher	2-1
31C-19	Stud	2-1	STD-160	Lockwasher	2-3
31CD-20	Stud	2-1	STD-160	Lockwasher	2-5
38-13	Stud	1-1	STD-160	Lockwasher	2-7
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STD-213	Seal	2-3	STD-1065	Dowel	1-5
STD-251	Washer	6-7	STD-1112	Elbow	6-10
STD-294	Gasket	2-7	STD-1164	Insert	6-5
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STD-355	Plug	6-3	STD-1204	Bolt	2-1
STD-405	Plug	6-3	STD-1205	Bolt	1-9
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STD-475	Lockwasher	2-5	STD-1339	Plug	1-1
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STD-514	Dowel	6-1	STD-1410	Nut	2-6
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STD-589	Gasket	6-3	STD-1411	Nut	1-9
STD-596	Nut	1-3	STD-1411	Nut	2-3
STD-596	Nut	1-4	STD-1411	Nut	2-5
STD-669	Washer	5-3	STD-1411	Nut	2-7
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STD-670	Nut	4-6	STD-1411	Nut	3-7
STD-670	Nut	6-10	STD-1411	Nut	4-6
STD-676	Nut	5-3	STD-1411	Nut	6-1
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STD-1688	Bolt	6-3	1182-K4	Spark Plug	4-7
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STD-1817	Bolt	5-3	59085	Lead	4-3
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STD-1828	Bolt	6-6	59087	Lead	4-3
STD-1838	Screw	1-8	59088	Lead	4-3
STD-1838	Bolt	5-2	59089	Lead	4-1
STD-1838	Bolt	5-3	59090	Lead	4-3
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STD-1890	Bolt	6-5	60430	Cover	2-3
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61548	Nameplate	6-3	68510	Stud	3-2
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61521-20A	Tube	6-8	68518	Lockplate	3-5
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66670	Bushing	3-2	69510	Housing	2-7
66670	Bushing	3-2	69531	Plate	3-5
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66728	Washer	3-5	69551	Gasket	2-5
66731	Cover	3-7	69603	Hose	6-4
66732	Gasket	3-7	69650	Pin	3-1
66734	Stud	1-1	69675	Connector	2-7
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67112	Rocker	3-7	69796	Dowel	1-1
67113	Rocker	3-7	69942	Stud	2-5
67114	Bushing	3-7	69943	Stud	6-1
67114	Bushing	3-7	69943	Stud	6-1
67193	Gasket	3-7	70310	Seal	3-5
67195	Flange	3-7	70384	Shaft	1-7
67514	Gear	1-5	70388	Gear	1-7
67516	Lockplate	1-5	70389	Gear	1-7
67528	Stud	1-1	70416	Roller	1-5
67530	Bushing	2-3	70419	Bracket	5-2
67530	Bushing	2-3	70454	Plug	1-7
67530	Bushing	2-3	70455	Gasket	1-7
67530	Bushing	2-3	70457	Gasket	1-4
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74802	Valve	3-4	75753	Magneto	4-1
74804	Relay	4-8	75761	Extension	1-4
74830	Gear Retainer	4-1	75838	Guide	3-2
74833	Housing	6-1	75906	Gasket	3-7
74863	Pulley	5-1	75941	Tape	4-5
74878	Fan	5-1	75944	Valve	2-7
74880	Alternator	5-1	75965	Clamp	4-1
74924	Cylinder	3-2	76026	Belt	4-9
74925	Cylinder	3-2	76028	Link	5-2
75030	Support Assy.	1-8	76081	Valve	3-4
75039	Crankshaft	1-5	76087	Cylinder	3-2
75040	Crankshaft Assy.	1-5	76118	Spacer	1-8
75060	Bolt	3-1	76148	Camshaft	1-5
75061	Bolt	3-1	76152	Housing	2-1
75073	Crankshaft Assy.	1-5	76153	Housing	2-1
75075	Crankshaft	1-5	76155	Shaft	1-8
75078	Crankshaft	1-5	76156	Shield	2-1
75079	Crankshaft Assy.	1-5	76161	Cap	1-3
75089	Piston	3-1	76162	Insert	1-3
75118	Gasket	3-7	76189	Cylinder	3-2
75133	Gage	1-4	76190	Cylinder	3-2
75151	Stabilizer	3-2	76211	Starter	5-5
75152	Stabilizer	3-2	76212	Starter	5-5
75164	Stabilizer	3-2	76304	Elbow	6-6
75176	Injector	6-6	76364	Elbow	6-6
75203	Hose	6-8	76420	Pulley	5-3
75220	Alternator	5-1	76486	Fuel Pump	2-6
75221	Support Assy.	1-8	76498	Gear Retainer	4-1
75247	Fuel Pump	2-6	76529	Plug	1-3
75277	Body	2-1	76533	Bracket	5-3
75283	Manifold	6-6	76534	Shim	5-4
75287	Body Assy.	2-1	76691	Gasket	2-7
75302	Dowel	1-1	76713	Adapter	2-5
75380	Link	5-3	76734	Zip Strap	4-6
75414	Bracket	6-7	76735	Bracket	6-10
75415	Cylinder	3-2	76737	Gear Assy.	2-3
75429	Hose	6-8	76743	Gear	2-5
75431	Hose	6-8	76750	Grommet	4-5
75433	Hose	6-8	76753	Sleeving	4-5
75444	Adapter	6-3	76755	Collar	4-5

NUMERICAL INDEX (CONT.)

PART NO.	PART NAME	PAGE NO.	PART NO.	PART NAME	PAGE NO.
757	Nut	4-5	77654	Spacer	6-6
76768	Lockwasher	5-3	77756	Bracket	5-3
76769	Locknut	5-3	77757	Bracket	5-3
775	Switch	5-5	77770	Extension	1-4
776	Switch	5-5	77807	Screw	1-3
76777	Manifold	6-7	77808	Valve	1-3
76778	Manifold	6-7	77852	Filter Base	2-7
779	Adapter	6-6	77853	Filter Housing	2-7
784	Shaft	2-1	77998	Housing	6-5
76786	Gear	1-5	78059	Relay	4-8
787	Roller	1-5	78060	Relay	4-8
788	Roller	1-5	78100	Housing	6-5
76789	Gage	1-4	78292	Gasket	4-1
76799	Crankshaft	1-5	78308	Alternator	5-1
801	Crankshaft Assy.	1-5	78309	Alternator	5-1
828	Plate	4-5	78310	Alternator	5-1
76885	Cable	4-3	78311	Alternator	5-1
76897	Gage	1-4	78312	Alternator	5-1
76923-48S70-63	Lead	4-3	78313	Alternator	5-1
76923-48S70-63	Lead	4-3	78314	Alternator	5-1
76923-48S70-63	Lead	4-3	78315	Alternator	5-1
76923-48S90-63	Lead	4-3	78368	Pin	1-8
76923-48S90-63	Lead	4-4	78407	Alternator	5-1
76923-48S110-63	Lead	4-3	78443	Seal	1-3
76923-48S110-63	Lead	4-3	78446	Support Assy.	1-8
76923-48S110-63	Lead	4-4	78490	Housing	2-1
76923-72S70-63	Lead	4-3	78527	Body	2-1
76923-72S70-63	Lead	4-3	78528	Body Assy.	2-1
76923-72S70-63	Lead	4-3	78530	Shaft	2-1
76923-72S90-63	Lead	4-3	78532	Impeller Assy.	2-1
76923-72S90-63	Lead	4-4	78535	Cable Assy.	4-3
76923-72S110-63	Lead	4-3	78537	Cable Assy.	4-3
7882	Plate	4-5	78543	Cable Assy.	4-3
7883	Grommet	4-5	78552	Harness	4-4
77003	Injector	6-6	78590	Sump	6-1
77156	Protector	4-6	78614	Pulley	5-3
77272	Impeller	2-1	78617	Shaft	5-3
77274	Harness	4-4	78619	Shaft	2-1
77290	Bracket	1-4	78629	Bearing	5-3
77293	Injector	6-6	78639	Pulley	5-3
77309	Bushing	2-3	78924	Manifold	6-7
77313	Impeller	2-1	78993	Fuel Pump	2-6
77369	Tube	6-8	79007	Manifold	6-7
77377	Seal	1-3	79008	Injector	6-6
77433	Elbow	6-10	79017	Spacer	2-3
77414	Cable Assy.	4-4	79018	Hose	6-8
77579	Support Assy.	1-8	79024	Bushing	1-5
77511	Gasket	3-7	79026	Crankshaft	1-5
77517	Crankshaft Assy.	1-5	79027	Crankshaft Assy.	1-5
77553	Housing	6-5	79034	Injector	6-6

NUMERICAL INDEX (CONT.)

PART NO.	PART NAME	PAGE NO.	PART NO.	PART NAME	PAGE NO.
79051	Spring	3-5	LW-11120	Grommet	4-5
79071	Gage	1-4	LW-11123	Spacer	4-5
LW-10076	Seat	3-4	LW-11147	Bracket	5-3
LW-10077	Seat	3-4	LW-11151	Support Assy.	1-8
LW-10091	Link	5-3	LW-11194	Cable Assy.	4-4
LW-10092	Belt	4-9	LW-11218	Injector	6-6
LW-10172	Magneto	4-1	LW-11220	Injector	6-6
LW-10179	Regulator	4-8	LW-11221-S	Crankcase	1-1
LW-10185	Regulator	4-8	LW-11250	Valve	3-4
LW-10207	Piston	3-1	LW-11273	Clamp	6-1
LW-10269	Valve	2-7	LW-11485	Tube	3-5
LW-10388	Elbow	4-5	LW-11694	Seal	3-5
LW-10389	Elbow	4-5	LW-11746	Injector	6-6
LW-10390	Elbow	4-5	LW-11750	Connecting Rod	3-1
LW-10445	Tube	6-8	LW-11795	Spring	3-4
LW-10446	Elbow	6-10	LW-11795	Spring	3-4
LW-10454	Housing	6-1	LW-11796	Spring	3-4
LW-10456	Housing	6-5	LW-11797	Spring	3-4
LW-10475	Nozzle	6-7	LW-11800	Spring	3-4
LW-10525	Crankshaft Assy.	1-5	LW-11867	Elbow	6-6
LW-10575	Shaft	1-8	LW-11924	Injector	6-6
LW-10576	Shaft	5-3	LW-11925	Tube	6-8
LW-10578	Pulley	5-3	LW-11959-48S	Lead	4-4
LW-10608	Clip	3-9	LW-11959-72S	Lead	4-4
LW-10609	Rivet	3-9	LW-11964	Crankcase	1-1
LW-10610	Baffle	3-9	LW-11994-48S90-75	Lead	4-4
LW-10611	Baffle	3-9	LW-11994-48S110-75	Lead	4-4
LW-10621	Crankshaft	1-5	LW-11994-72S90-75	Lead	4-4
LW-10622	Injector	6-6	LW-11994-72S110-75	Lead	4-4
LW-10641	Housing	2-1	LW-12030	Crankcase	1-1
LW-10642	Hose	6-8	LW-12083	Switch	5-5
LW-10646	Connecting Rod	3-1	LW-12098-0-100	Tube	6-8
LW-10647	Dowel	1-1	LW-12098-1-134	Tube	6-8
LW-10701	Grommet	4-5	LW-12098-1-170	Tube	6-8
LW-10799	Spacer	2-6	LW-12098-1-200	Tube	6-8
LW-10806	Spacer	2-5	LW-12098-1-210	Tube	6-8
LW-10807	Adapter	2-5	LW-12098-2-276	Tube	6-8
LW-10843	Crankshaft	1-5	LW-12136	Cushion	4-1
LW-10844	Crankshaft Assy.	1-5	LW-12186	Nut	3-1
LW-10971	Belt	4-9	LW-12191	Pipe	6-4
LW-10975	Gage	1-4	LW-12192	Pipe	6-4
LW-10976	Injector	6-6	LW-12193	Pipe	6-4
LW-11007	Injector	6-6	LW-12194	Pipe	6-4
LW-11033	Crankcase	1-1	LW-12195	Pipe	6-4
LW-11035	Crankcase	1-1	LW-12199	Clip	4-6
LW-11036	Crankcase	1-1	LW-12202	Clip	6-10
LW-11037	Crankcase	1-1	LW-12293	Clip	6-10
LW-11038	Crankcase	1-1	LW-12516	Clip	6-10
LW-11117	Elbow Assy.	4-5	LW-157208	Kit	4-1
LW-11118	Elbow Assy.	4-5	LW-157209	Kit	4-1

NUMERICAL INDEX (CONT.)

PART NO.	PART NAME	PAGE NO.	PART NO.	PART NAME	PAGE NO.
620465-2	Harness	4-3	10-620632-48	Lead	4-3
W-620470-2	Harness	4-3	10-620632-48	Lead	4-3
W-620515-1	Harness	4-3	10-620632-72	Lead	4-3
620409-127	Lead	4-4	10-620632-72	Lead	4-3
620409-128	Lead	4-4	10-620633-48	Lead	4-3
0-320417-66	Lead	4-4	10-620633-72	Lead	4-3
0-320417-67	Lead	4-4			

VENDOR SECTION

FUEL PUMP ASSEMBLY (LEAR SIEGLER)

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
1	RG-17980	PUMP ASSEMBLY, Fuel (P/N 74547)		A
	RG-17980-D	PUMP ASSEMBLY, Fuel (P/N 76486)		B
	RG-17980-J	PUMP ASSEMBLY, Fuel (P/N 78993)		C
2	MS20995NC32	LOCKWIRE	un	
3	AN500A10-22	SCREW	4	
4	RA4203	WASHER	4	
5	RB-15997	CAP ASSEMBLY	1	
	RB-15996	CAP	1	
6	AN510-A10-10	SCREW	1	
7	RA-7763	BALL	1	
8	RA-7362	SPRING, Relief valve	1	
9	RB-15985	VALVE ASSEMBLY, Relief	1	
10	RA-5575	PLATE, Name	1	
11	AN535-00-2	SCREW	2	
12	RA-9099	PLATE, Instruction	1	
13	AN535-00-2	SCREW	4	
14	RG-15982	HOUSING, Valve	1	
15	RA-7427	VALVE, Bypass	1	
16	RA-7424	SPRING, Bypass valve	1	
17	RA-7425	CAGE, Bypass valve	1	
18	RA-15981	GASKET	1	
19	RA-7438	PLATE, Thrust	1	
20	RA-7491	BLADE	1	
21	MS16624-1062	RING, Retaining	1	
22	RB-7779-2	COUPLING, Drive	1	A
	RB-7779-4	COUPLING, Drive	1	B
	RB-7779	COUPLING, Drive	1	C
23	RA-7791	ROTOR	1	
24	MS16625-1112	RING, Retaining	1	
25	RA-6861	SEAL, Shaft	1	
	RB-16043	BODY LINER AND BEARING ASSEMBLY	1	
26	RA-7493	LINER	1	
27	RS16903-55	PIN	1	
28	RA-1774	BEARING	1	
29	RS16903-55	PIN	1	
30	RD-7492	BODY	1	
31	RA3485-1	PLUG	1	

VENDOR SECTION

FUEL PUMP ASSEMBLY (LEAR SIEGLER)

REF. NO.	PART NUMBER	1	2	3	4	5	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
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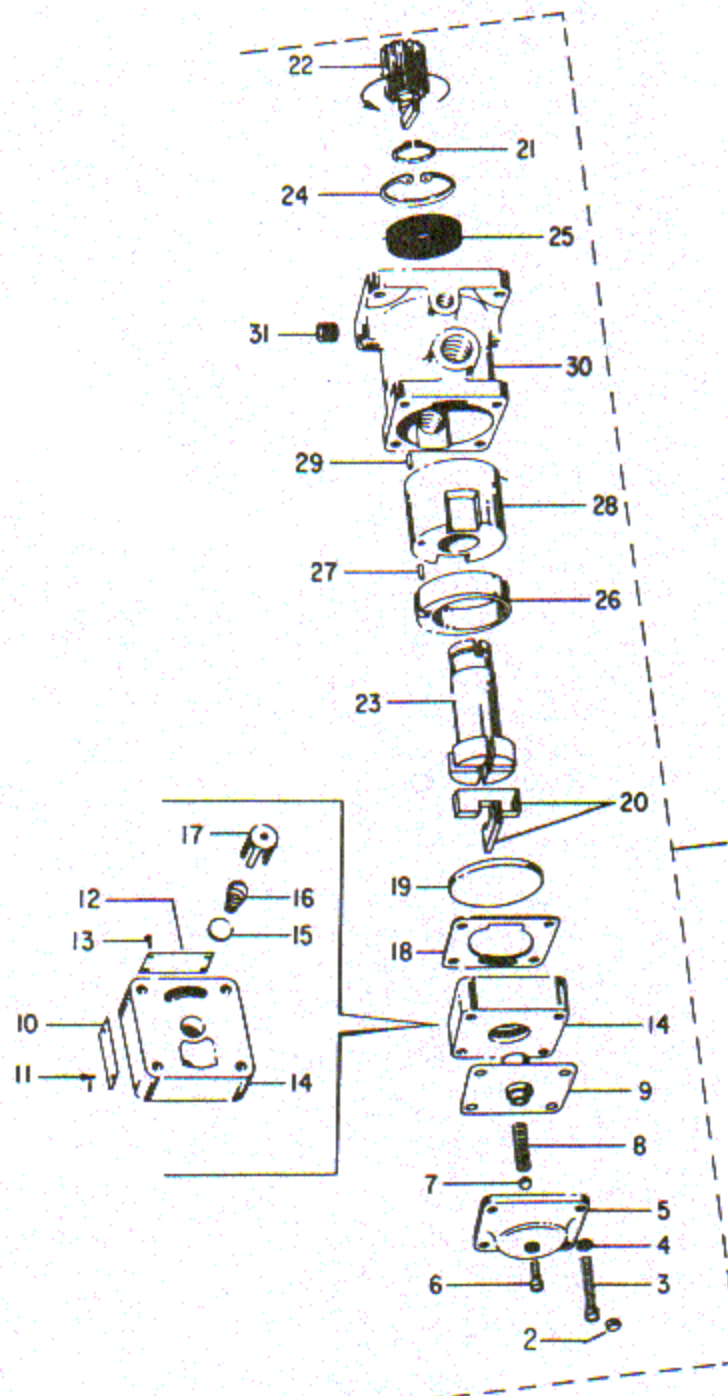


Figure 34

VENDOR SECTION

MAGNETO ASSEMBLY (S6LN-200) BENDIX-SCINTILLA

REF. NO.	PART NUMBER	1 2 3 4 5	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	10-16310-10		MAGNETO ASSEMBLY, S6LN-204		A
	10-163050-9		MAGNETO ASSEMBLY, S6LN-200		B
1	10-160858		HOUSING, Magneto	1	
2	10-157134		PLUG, Ventilator, magneto housing	1	
3	10-357165		COIL	1	
4	10-50765		CLAMP, Coil core	2	
5	10-35937-8		SCREW, w/Lockwasher	2	
6	10-81806		BEARING, Ball	1	
7	2-161-1		WASHER, Flat, 0.0025 in. thick	un	
	2-161-2		WASHER, Flat, 0.004 in. thick	un	
	2-161-3		WASHER, Flat, 0.005 in. thick	un	
	2-161-4		WASHER, Flat, 0.008 in. thick	un	
	2-161-5		WASHER, Flat, 0.010 in. thick	un	
	2-161-6		WASHER, Flat, 0.012 in. thick	un	
	2-161-7		WASHER, Flat, 0.0015 in. thick	un	
8	10-52947		MAGNET, Rotating	1	
9	10-90788-5		KEY, Woodruff	1	
10	10-157120-Y		GEAR, Distributor, small	1	
11	10-3503		WASHER, Plain (breaker end bearing)	1	
12	2-199-1		WASHER, Flat, 0.0025 in. thick	un	
	2-199-2		WASHER, Flat, 0.004 in. thick	un	
	2-199-3		WASHER, Flat, 0.005 in. thick	un	
	2-199-4		WASHER, Flat, 0.008 in. thick	un	
	2-199-5		WASHER, Flat, 0.010 in. thick	un	
	2-199-6		WASHER, Flat, 0.012 in. thick	un	
13	2-202		BEARING, Ball (magnet, breaker end)	1	
14	10-88543-5		CAM, Breaker	1	
15	10-51354		WASHER, Plain (cam screw)	1	
16	10-35936-10		SCREW, w/Lockwasher (cam)	1	
17	10-163056		HOUSING, Distributor	1	A
	10-106498		HOUSING, Distributor	1	B
18	10-157135		PLUG, Distributor	1	
19	10-52958		BLOCK, Distributor	1	
20	10-50737		SPRING, Helical	6	
21	10-163374		STRIP, Felt (gear side)	1	
22	10-50752		WASHER, Felt (ring side)	1	
23	10-102083		SCREW, w/Lock and plain washer	3	
24	10-157197		GEAR, Distributor, large	1	
25	10-50753		WASHER, Plain, dist. gear axle	1	
26	10-31282		RING, Retaining, dist. gear axle	1	
27	10-160844		BRUSH, Carbon	1	
28	10-157158		SCREW, w/Lockwasher (dist. hsg. to magneto hsg.)	5	
29	10-382585		CONTACT ASSEMBLY, (Tungsten R. H.)	1	
30	10-14268		WASHER, Plain	2	A
31	10-14268		WASHER, Plain	1	B
32	10-35936-7		SCREW, w/Lockwasher	4	A
	10-35936-7		SCREW, w/Lockwasher	2	B
33	10-163194		INSULATION SHEET	1	
34	10-147241		LEAD, Retard assembly	1	A
35	10-163137		CAPACITOR	1	
36	10-35935-5		SCREW, w/Lockwasher (capacitor to breaker cover)	2	
37	10-163176		COVER, Breaker	1	
38	10-157160		SCREW, w/Lockwasher (breaker cover)	4	
39	10-163384		DISK	1	B
40	10-163177		NUT, Cap	1	B

VENDOR SECTION

MAGNETO ASSEMBLY (S6LN-200) BENDIX-SCINTILLA

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
		1 2 3 4 5		
41	10-25788	BEARING, Sleeve (drive shaft)	1	
42	10-27448	OIL SEAL, Drive shaft	1	
43	10-51678	DEFLECTOR	1	
44	10-163048	BUSHING, Impulse coupling	1	
45	10-163178	NUT, Drive shaft	1	
46	10-90751-19	PIN, Cotter (drive shaft nut)	1	
47	10-357011	PLATE, Identification	1	
48	10-90500-5	SCREW, Drive	2	

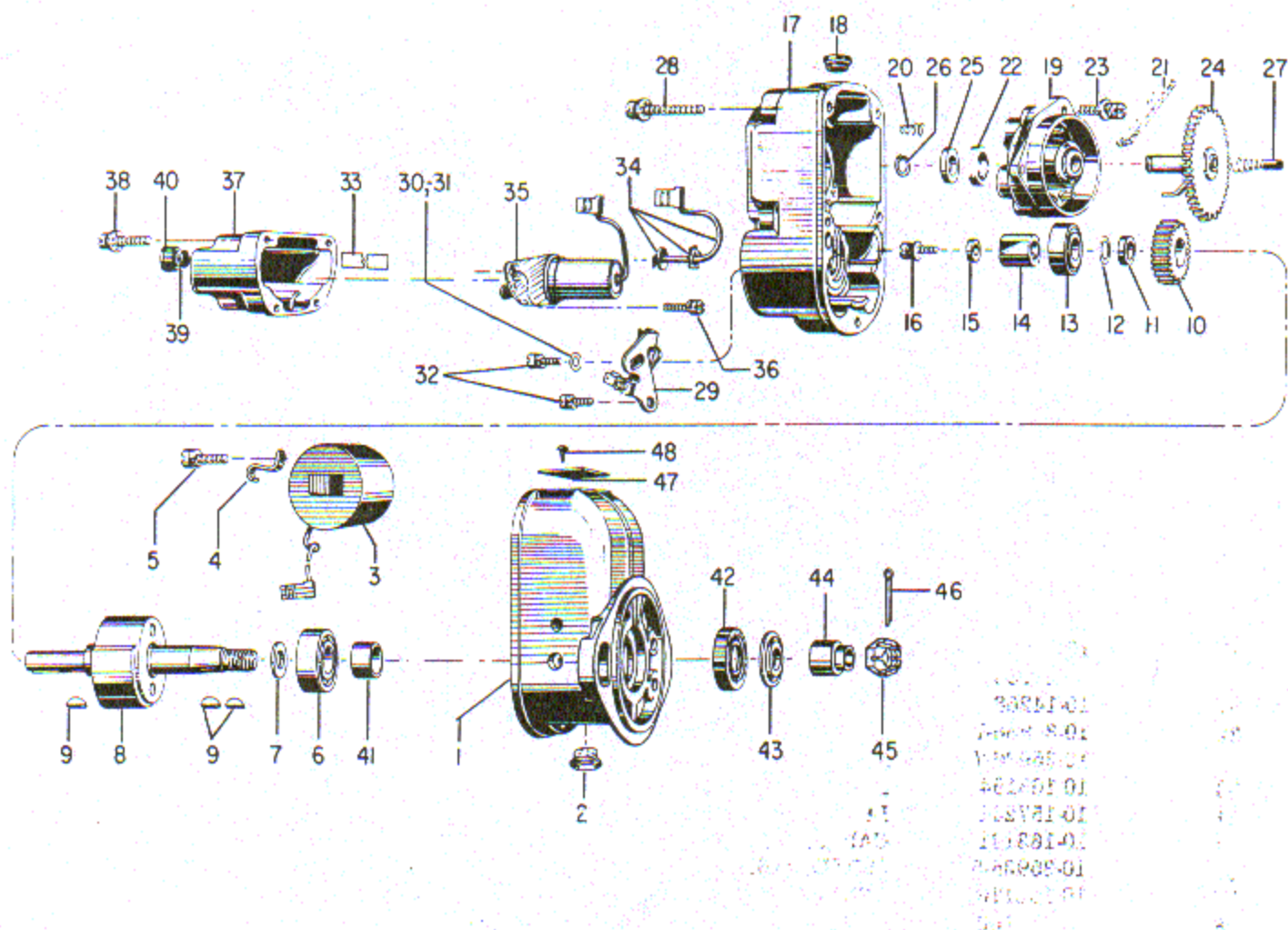


Figure 35

VENDOR SECTION

MAGNETO ASSEMBLY (S6LN-1200) BENDIX-SCINTILLA

REF. NO.	PART NUMBER	1 2 3 4 5	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	10-349290-1		MAGNETO ASSEMBLY, S6LN-1208		A
	10-349310-1		MAGNETO ASSEMBLY, S6LN-1209		B
	10-349310-8		MAGNETO ASSEMBLY, S6LN-1209		C
	10-349370-4		MAGNETO ASSEMBLY, S6LN-1227		D
1	10-35937-24		SCREW, w/Lockwasher (cover securing)	1	
2	10-92873-302		NUT, Stud	4	
	10-92873-302		NUT, Retard lead contact screw	1	A, C
3	10-90701-5		WASHER	4	
4	10-349393-1		COVER, Magneto	1	A
	10-349393-2		COVER, Magneto	1	B, D
	10-349393-3		COVER, Magneto	1	C
5	10-125996		BUSHING, Retard lead securing screw	1	A, C
6	10-35937-12		SCREW, Retard lead securing	1	A, C
7	10-349269		LEAD, Retard	1	A, C
8	10-16092		WASHER, Retard lead securing screw	1	A, C
9	10-35935-6		SCREW, Capacitor securing	2	
10	10-349276		CAPACITOR	1	
11	10-349263		PACKING, Capacitor mounting	1	
12	10-349221		STUD, Double-end, dist. block securing	4	
13	10-78655		WASHER, Stud securing	4	
14	10-92815-37		RING, Retaining, gear axle	1	
15	10-349511		WASHER, Gear axle	1	
16	10-50752		WASHER, Felt, gear axle	1	
17	10-349212		BLOCK, Distributor (6 cylinder)	1	
18	10-50737		SPRING, Helical, dist. block	6	
19	10-163374		STRIP, Felt, dist. block	1	
20	10-349237		GEAR ASSEMBLY, Large (6 cylinder)	1	
21	10-160844		BRUSH, Carbon	1	
22	10-35936-7		SCREW, Contact assembly securing	4	A
	10-35936-7		SCREW, Contact assembly securing	2	B, C, D
	10-35936-7		SCREW, Coil lead clamp	1	B, D
23	10-5752		CLIP, Cable	1	B, D
24	10-14268		WASHER, Contact assembly securing screw	2	A
	10-14268		WASHER, Contact assembly securing screw	1	B, C, D
25	10-382585		CONTACT ASSEMBLY, R. H. (Tungsten)	1	
26	10-35936-10		SCREW, Cam securing	1	
27	10-51354		WASHER, Cam securing screw	1	
28	10-349243-1		CAM, 4 and 6 cylinder	1	
29	10-349326		STRIP, Fish paper	1	
30	10-349219		WEDGE, Coil	2	
31	10-349271		COIL, Magneto, high tension	1	
32	10-90751-19		PIN, Cotter	1	
33A	10-163151		NUT, Castellated, drive shaft	1	
34	10-163178		NUT, Castellated, drive shaft	1	
35	10-163048		BUSHING, Impulse coupling	1	
36	10-90788-5		KEY, Woodruff, drive member	1	
	10-90788-5		KEY, Woodruff, drive shaft	1	
37	10-116860		WASHER, Drive shaft nut	1	D
38	10-349371		IMPULSE COUPLING	1	D
39	10-70371		BODY, Impulse coupling	1	D
40	10-51324		SPRING, Main impulse coupling	1	D
41	10-349257-4		CAM ASSEMBLY, Impulse coupling	1	D
42	10-92815-62		RING, Retaining, drive shaft end	1	
43	10-349228		WASHER, Flat, flange	1	
44	10-319249		WASHER, Bowd flange	1	
45	10-349248		SLINGER, Oil	1	

VENDOR SECTION

MAGNETO ASSEMBLY (S6LN-1200) BENDIX-SCINTILLA

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
46	10-349652	SCREW, Flange securing	3	
47	10-53397	WASHER, Flange securing screw	3	
48	10-349392-2	FLANGE, Short round (without stop pins)	1	A, B, C
	10-349392-6	FLANGE, Short round (with 2 stop pins)	1	D
49	10-349438-R	STOP PIN, Flange	2	D
50	10-353056	BEARING, Magneto drive end	1	
51	10-349247	PLATE, Bearing retaining	1	
52	10-349351-1	MAGNET, Rotating	1	
53	10-349242	GEAR, Distributor, small	1	
54	10-157134	VENTILATOR	1	
55	10-157135	PLUG, Timing	1	
56	10-90500-8	SCREW, Identification plate, securing	2	
57	10-70616	PLATE, Identification	1	
58	10-353060	BEARING, Roller	1	
59	10-348394-4	HOUSING, Magneto	1	A
	10-349394-3	HOUSING, Magneto	1	B, C, D

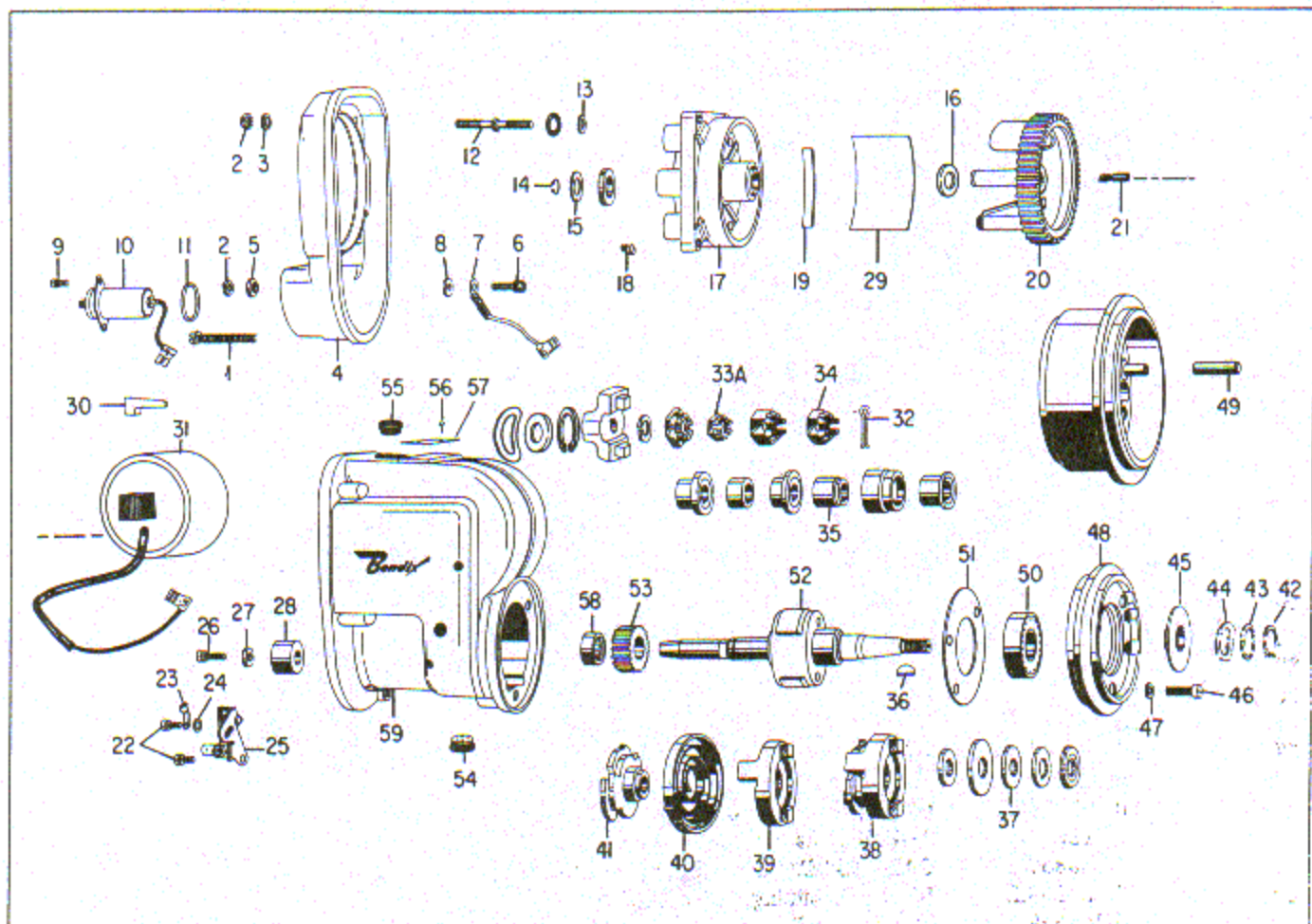


Figure 36

VENDOR SECTION

STARTER ASSEMBLY (12V, 24V.) PRESTOLITE

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	MZ-4206	STARTING MOTOR, 12 Volt, 3.38:1 ratio	1	A
	MHB-4001	STARTING MOTOR, 24 Volt, 3.38:1 ratio	1	B
1	EBB-75A	BENDIX DRIVE (Eclipse no. 480045)	1	A, B
2	MZ-244	BAND, Cover	1	A, B
3	MZ-393	PLATE, Retainer	1	A, B
4	MZ-394	SHAFT, Bendix drive	1	A, B
5	MZ-396	GEAR	1	A, B
6	MZ-1390	HOUSING ASSEMBLY, Gear	1	A, B
7	XA-997	BEARING, Needle, 1/2 inch	1	A, B
8	XA-998	BEARING, Needle, 0.812 inch	1	A, B
9	MZ-2397	FRAME AND FIELD ASSEMBLY	1	A
	MHB-2397	FRAME AND FIELD ASSEMBLY	1	B
10	MZ-2399	ARMATURE	1	A
	MHB-2399	ARMATURE	1	B
11	MZ-2400	HEAD ASSEMBLY, Commutator end	1	A
	MHB-2400	HEAD ASSEMBLY, Commutator end	1	B
12	MZ-19S	SPRING SET, Brush	1	A, B
13	PS-1432	HOUSING ASSEMBLY, Pinion	1	A, B
14	MZ-389	BEARING, Bronze-graphite	1	A, B
15	X-3212	BEARING, Ball, sealed, arm. shaft	1	A, B
16	P90-601	THRUST WASHER PACKAGE	1	A, B
17	MBG-2012S	BRUSH SET, Service	1	A
	MHB-2012S	BRUSH SET, Service	1	B

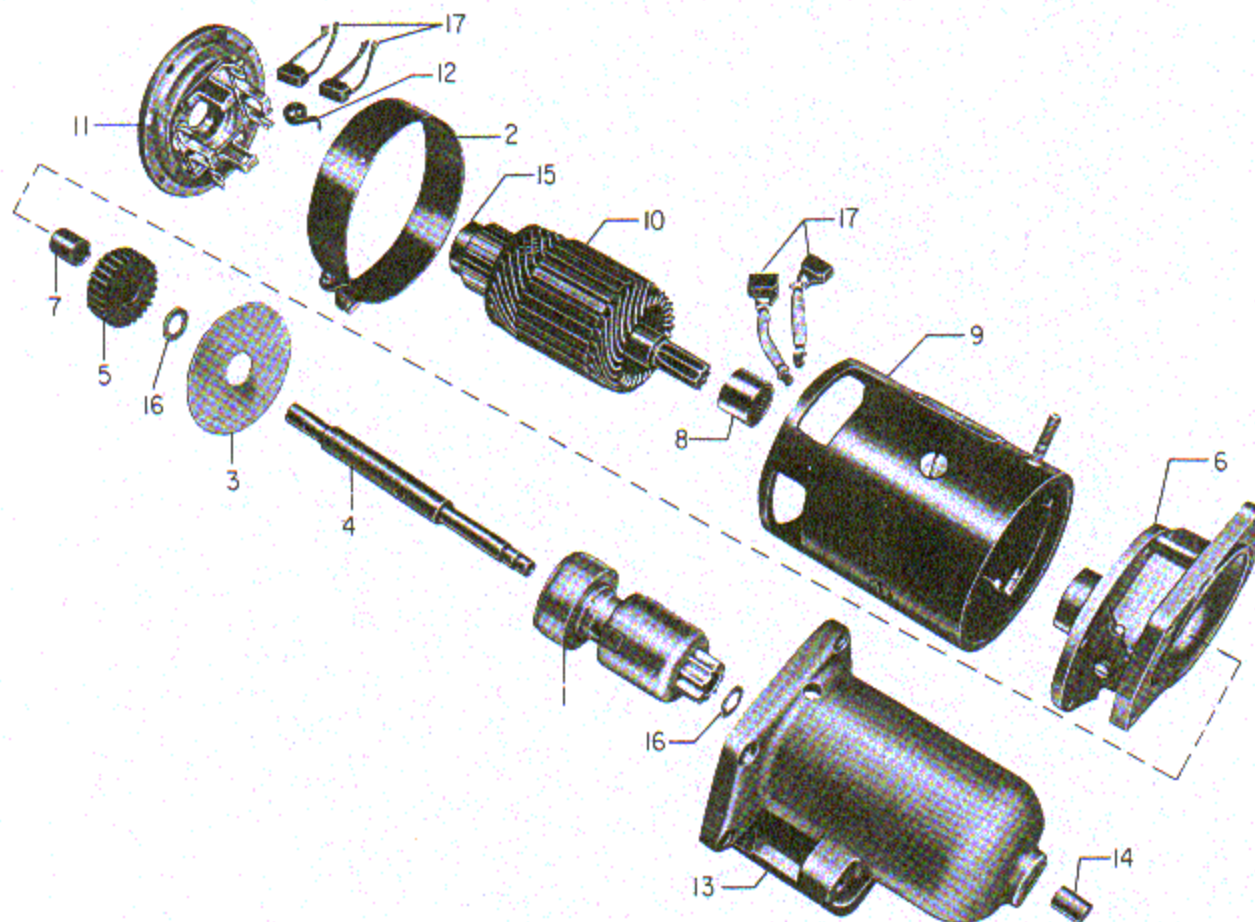


Figure 37

REF. NO.	PART NUMBER	12345	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	ALE-8406		ALTERNATOR ASSEMBLY, 12V.-40Amp.	1	A
	ALT-8404		ALTERNATOR ASSEMBLY, 24V.-50Amp.	1	B
	ALU-8403		ALTERNATOR ASSEMBLY, 24V.-70Amp.	1	C
	ALX-8403		ALTERNATOR ASSEMBLY, 12V.-70Amp.	1	D
	ALY-8403		ALTERNATOR ASSEMBLY, 12V.-60Amp.	1	E
1	P90-2014		BEARING AND SEAL ASSY., S.R.E.	1	A, B, C, D, E
2	ALU-1045A		BRUSH HOLDER ASSEMBLY	1	A, B, C, D, E
3	ALE-1012NS		BRUSH SET, Service	1	A, B, C, D, E
4	ALA-19S		SPRING SET, Brush	1	A, B, C, D, E
5	ALU-1062A		COVER, Slip ring end	1	A, B, C, D, E
6	P90-818		EYELET, Package	1	A, B, C, D, E
7	PU-1605A		FAN, Ventilating	1	A, B, C, D, E
8	ALE-1003N		HEAD ASSEMBLY, Drive end	1	A, B, C, D, E
9	X-3416		BEARING, Ball, S.A.E. no.203	1	A, B, C, D, E
10	ALK-1032BS		HEAD ASSEMBLY, Slip ring end	1	A, E
	ALK-1032CS		HEAD ASSEMBLY, Slip ring end	1	B, C, D
11	XA-944J		RECTIFIER, Negative	3	A, B, C, D, E
12	P90-33		NUT AND WASHER PACKAGE	1	A, B, C, D, E
13	ALE-54A		PLATE, Rectifier mounting	1	A
	ALE-54D		PLATE, Rectifier mounting	1	B
	ALE-1054G		PLATE ASSEMBLY, Rectifier	1	C, D, E
14	XA-943-F		RECTIFIER, Positive	3	A, B, C, D, E
15	PU-672		PULLEY, Drive	1	A, B, C, D
16	GR-32		RETAINER, Drive end	1	A, B, C, D, E
17	ALE-2073S		ROTOR ASSEMBLY	1	A, E
	ALE-2028S		ROTOR ASSEMBLY	1	B
	ALU-2028S		ROTOR ASSEMBLY	1	C
	ALH-2028S		ROTOR ASSEMBLY	1	D
18	ALD-21		SPACER, Rotor shaft	1	A, B, C, D, E
19	ALE-2008-AD		STATOR ASSEMBLY	1	A
	ALE-2008-AA		STATOR ASSEMBLY	1	B
	ALE-2008-AB		STATOR ASSEMBLY	1	C, D
	ALE-2008-AE		STATOR ASSEMBLY	1	E
20	P90-506		TERMINAL STUD AND PARTS PACKAGE	1	A, B
	P90-2030		TERMINAL STUD AND PARTS PACKAGE	1	C, D, E
21	ALA-20JS		THRU BOLT PACKAGE	1	A, E
	ALA-20GS		THRU BOLT PACKAGE	1	B, C, D

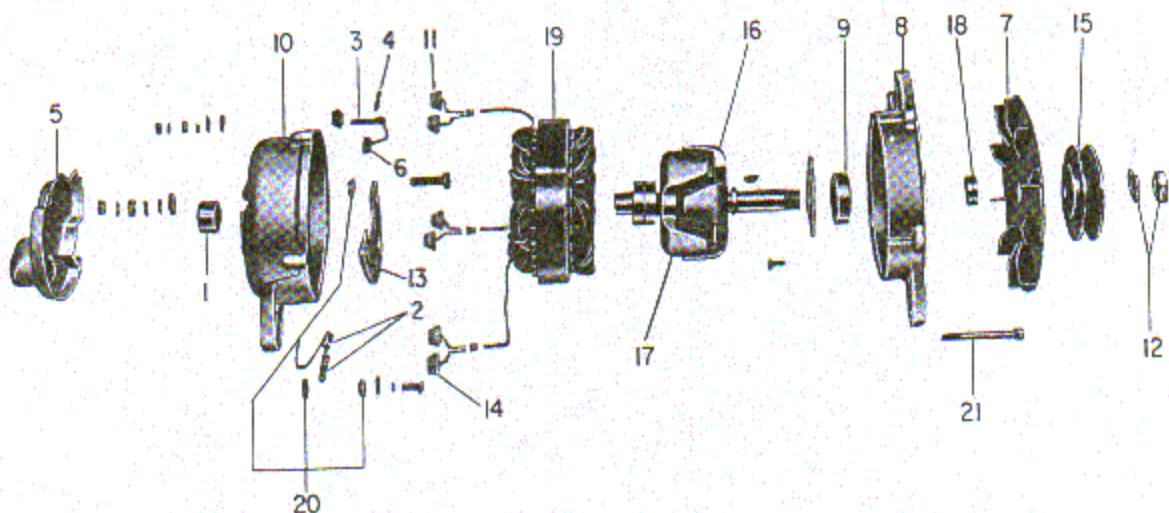


Figure 38

VENDOR SECTION

ALTERNATOR ASSEMBLY, DELCO-REMY

REF. NO.	PART NUMBER	1 2 3 4 5	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	1100717		ALTERNATOR ASSEMBLY, 12V.-70Amp.	1	A
	1100718		ALTERNATOR ASSEMBLY, 24V.-50Amp.	1	B
1	1964858		FRAME, Slip ring end		A, B
2	1964512		ROTOR ASSEMBLY		A
	1964221		ROTOR ASSEMBLY		B
3	1961531		STATOR ASSEMBLY		A
	1959531		STATOR ASSEMBLY		B
4	1959917		FRAME, Diode end		A, B
5	1964354		DIODE		A, B
	1964353		DIODE		A, B
6	1965276		BRUSH HOLDER AND BRUSH ASSEMBLY		A, B
7	1964117		BRUSH, Spring		A, B
8	7451326		BEARING, Slip ring end		A, B
9	905920		BEARING, Diode end		A, B
10	1959832		TERMINAL PACKAGE (Battery)		A, B
11	1959833		TERMINAL PACKAGE (Ground)		A, B
11	1959834		TERMINAL PACKAGE (Diode junction)		A, B
12	1963213		BEARING RETAINER		A, B
13	1953211		COLLAR, Inside		A, B
14	1941978		LOCKWASHER, Shaft nut, diode end		A, B
15	9419392		LOCKWASHER, Diode junction terminal		A, B
	9419392		LOCKWASHER, Capacitor terminal screw		A, B
16	9418854		NUT, Diode junction terminal		A, B
17	1915172		NUT, Shaft, diode end		A, B
18	1961526		SCREW, Ball bearing retainer attaching		A, B
19	1961530		SCREW, Brush holder attaching		A, B
20	9418855		SCREW, Capacitor terminal		A, B
21	1959523		WASHER, Insul. capacitor screw		A, B
22	815540		WASHER, Capacitor terminal screw		A, B
23	1961521		BOLT, Thru, 2-1/8 in. long		A, B
24	1961522		BOLT, Thru, 3-13/32 in. long		A, B
25	1959455		CAPACITOR		A, B
26	1959532		CLIP, Stator lead terminal		A, B
27	1952244		RING, Collector, diode end		A, B
28	1961523		SPACER, Diode end		A, B
29	1960750		SPRING, Capacitor retaining		A, B

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	12345			

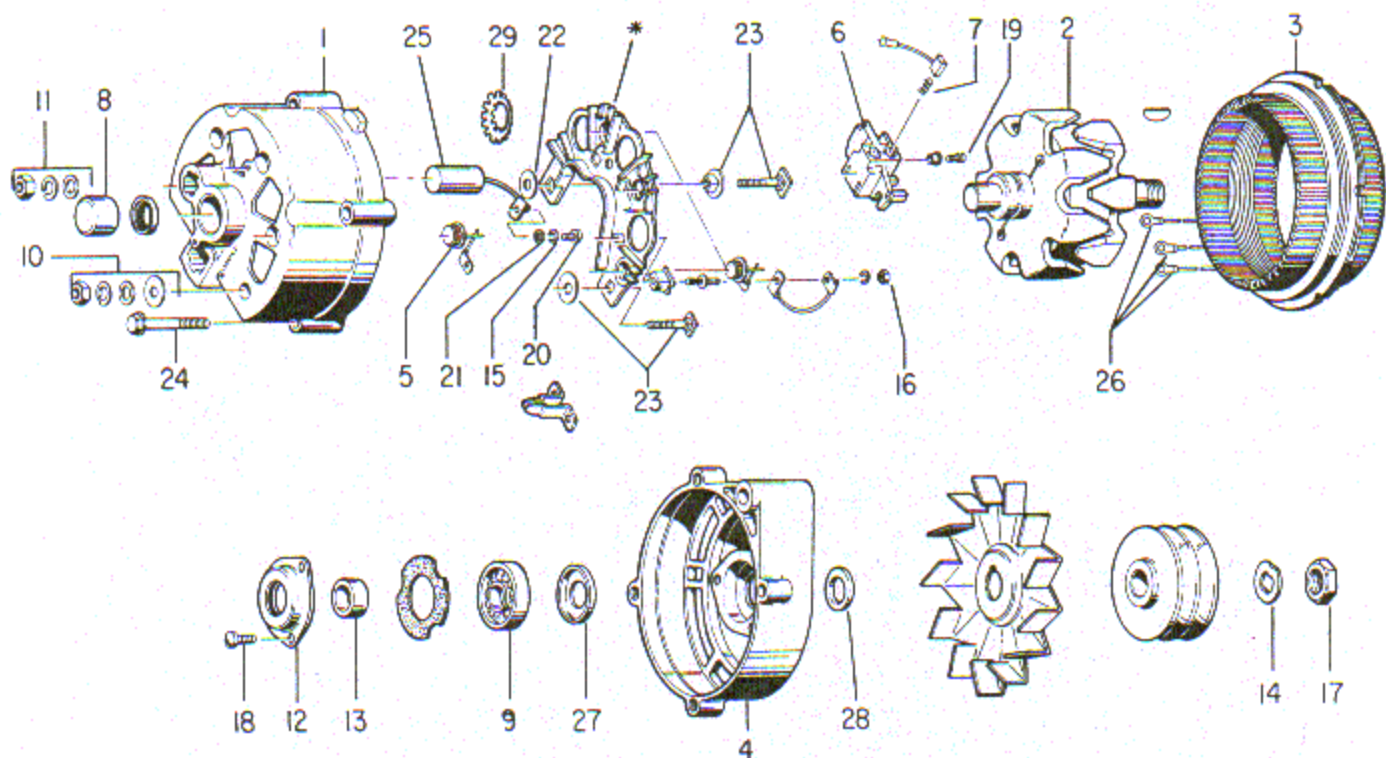


Figure 39

VENDOR SECTION

GENERATOR ASSEMBLY, DELCO-REMY

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
		1 2 3 4 5		
	1101905	GENERATOR ASSEMBLY, 24V.-25Amp.	1	A
	1101915	GENERATOR ASSEMBLY, 12V.-50Amp.	1	B
	1105052	GENERATOR ASSEMBLY, 24V.-40Amp.	1	C
	1105053	GENERATOR ASSEMBLY, 24V.-50Amp.	1	D
1	1930314	ARMATURE		A
	1945122	ARMATURE		B
	1945105	ARMATURE		C, D
2	1929703	FIELD COIL, R. H.		A
	1925031	FIELD COIL, R. H.		B
	1945098	FIELD COIL, R. H.		C, D
3	1908839	FRAME, Commutator end		A
	1943590	FRAME, Commutator end		B
	1952232	FRAME, Commutator end		C, D
4	1925832	FRAME, Diode end		A, B
	1945101	FRAME, Diode end		C, D
5	954162	BALL BEARING, Commutator end		A, B
	900529	BALL BEARING, Commutator end		C, D
6	954143	BALL BEARING, Diode end		A, B
	900529	BALL BEARING, Diode end		C, D
7	1908999	PLATE, Brush		A, B
8	1906984	BRUSH		A, B
	1906974	BRUSH		C, D
9	1903720	SPRING, Brush		A, B, C, D
10	1850759	ARM, Brush		A, B
	1878183	ARM, Brush		C, D
11	1908843	PULLEY		A, B, C, D
12	1927844	PLATE, Bearing retainer		A, B, C
	1952245	PLATE, Bearing retainer		D
13	1914186	TERMINAL STUD AND LEAD		A, B, C, D
14	1858751	TERMINAL STUD ONLY		A, B, D
	1910359	TERMINAL STUD ONLY		C
15	1886685	THRU BOLT		A, C, D
	1908680	THRU BOLT		B
16	1911961	SHOE, Pole		A
	1914681	SHOE, Pole		B
	1918004	SHOE, Pole		C, D
17	1910131	BAND, Cover		A, B
	1945106	BAND, Cover		C, D
18	1880781	LOCKWASHER, Ball bearing plate screw		A, C, D
	1914123	LOCKWASHER, Ball bearing plate screw		B
19	1904377	LOCKWASHER, Brush lead attaching screw		A, B, C, D
20	121841*	LOCKWASHER, Cover plate attaching screw		A
21	1904661	LOCKWASHER, Terminal stud		A, B, C, D
22	120638	LOCKWASHER, Thru-bolt		A, B, C, D
23	453299	LOCKWASHER, Brush plate screw		B
24	1888439	LOCKWASHER, Shaft nut, diode end		C
25	120614*	NUT, Cover band screw		A, C, D
26	1935548	NUT, Shaft, diode end (nylon insert)		A, B, C
27	121743	NUT, Terminal		A, B, C, D
	453433*	NUT, Cover band screw		B
	1953794	NUT, Shaft, diode end		D
28	5017850	SCREW, Ball bearing retainer plate		A, B, C, D
29	132688	SCREW, Brush lead attaching		A, C, D
30	1886496	SCREW, Brush plate attaching		A
31	132923*	SCREW, Cover band		A, B, C, D

VENDOR SECTION

GENERATOR ASSEMBLY, DELCO-REMY

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
32	1843646	SCREW, Pole shoe		A
	453460	SCREW, Brush lead attaching		B
	454408	SCREW, Brush plate attaching		B
	1918960*	SCREW, Field lead, attach to frame		B
	1883864	SCREW, Pole shoe		C, D
33	1857412	WASHER, Brush arm spacing		A, B, C, D
34	809945	WASHER, Space, inside (diode end)		A, B, C, D
35	1858753	WASHER, Insulating, terminal stud		A, C, D
36	1881409*	WASHER, Plain, terminal stud		A, C, D
	1902746	WASHER, Insulation, terminal stud		B
37	1885090*	BUSHING, Insulation, terminal stud		A, B, C, D
38	1861591	COLLAR, Spacing, outside (diode end)		A, B
39	1927843*	COLLECTOR, Static		A
40	1886684	DOWEL PIN		A, B
41	1912073*	INSULATOR, Field coil		A
42	200242	TERMINAL CLIP (to brush L. H.)		A
43	455613	TERMINAL CLIP (to brush R. H.)		A
44	124545	WOODRUFF KEY (Diode end)		A, B, C, D
	1914491*	INSULATOR, Field coil		B
	200362	TERMINAL CLIP TO BRUSH		B, C, D
	1929959*	CLAMP, Bearing retainer		C, D
	1914198	COLLAR, Spacing, outside (diode end)		C, D
	1920738*	COLLECTOR SPRING, (Diode end)		C, D
45	809062	DOWEL PIN		D

* - Not illustrated.

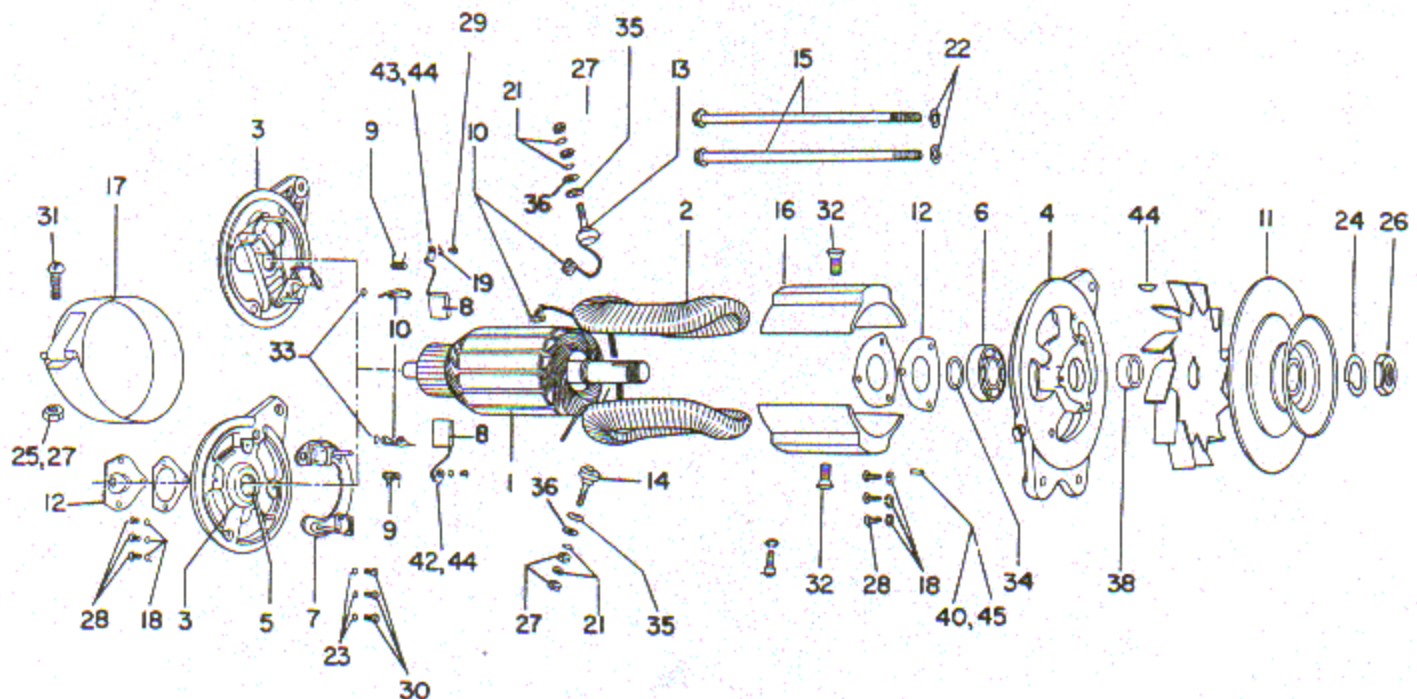


Figure 40

VENDOR SECTION

FUEL INJECTOR (RSA-5AD1) BENDIX

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	2524054-4*	INJECTOR ASSEMBLY, Fuel		A
	2524213-4	INJECTOR ASSEMBLY, Fuel		B
	2524243-4	INJECTOR ASSEMBLY, Fuel		C
	2524459-2	INJECTOR ASSEMBLY, Fuel		D
3	2525202	ADAPTER	1	
4	2522271	ELBOW	1	
17	2521287	LEVER, Mixture control	1	A, D
17	2522004	LEVER, Mixture control	1	B, C
20	2521196	LEVER	1	A, B, C
20	2521287	LEVER	1	D
24	P60129	SPRING, Helical, compression	1	
25	2524469A	FUEL INJECTOR ASSEMBLY	1	

* - Parts listed above are stocked by Avco Lycoming.

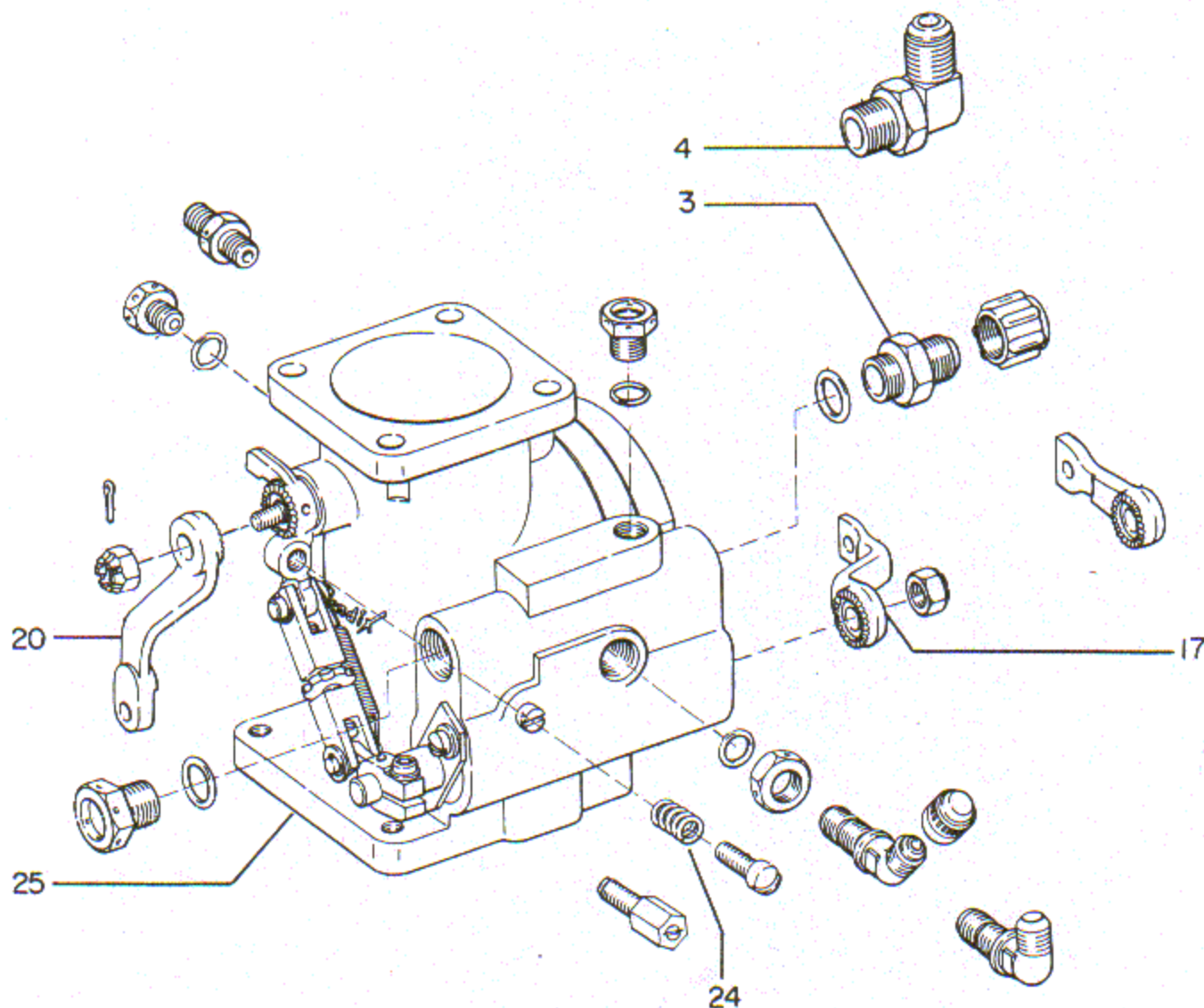


Figure 41

VENDOR SECTION

FUEL INJECTOR (RSA-5AD1) BENDIX

REF. NO.	PART NUMBER	1 2 3 4 5	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
2	367756*		PLATE, Identification	1	
1	186739		SCREW, Self-tapping	2	
5	2522712		STRAINER ASSEMBLY	1	
6	P61195		PLUG, Taper seat, 1/4-28	1	
7	P61195		PLUG, Taper seat, 1/4-28	1	
8	P61195		PLUG, Taper seat, 1/4-28	1	
9	2525165		SPRING, Helical, extension	1	
18	2520876		LINK	1	
20	367547		SCREW ASSEMBLY, Idle	1	
28	2520879		PLATE, Mixture control	1	
29	2523840		BUSHING, Mixture control stem	1	
31	367694		HOLDER SPRING	1	
32	2523757		SPRING, Helical, compression	1	
34	2520878		BUSHING	1	
36	2522591		LEVER ASSEMBLY, Mixture control	1	
37	328617		SEAL, Aluminum	1	
41	2523719		LEVER ASSEMBLY, Idle valve	1	
46	2522326		PLATE, Idle valve	1	
47	2526408		BUSHING, Idle valve shaft	1	
52	2525195		VALVE, Mixture control	1	
54	2520626		VALVE, Idle	1	
61	2523501		COVER	1	
64	2529181		HOLDER, Spring	1	
65	2520625		SPRING, Helical, compression	1	
66	2529182		BUSHING	1	
67	2529183		BUSHING	1	
68	2529470		DIAPHRAGM ASSEMBLY	1	
69	2520652		SPRING, Helical, compression	1	
69A	2526135		BODY ASSEMBLY, Regulator	1	
70	2529188		BUSHING ASSEMBLY	1	
71	367727		SHIM	un	
73	2529471		DIAPHRAGM ASSEMBLY	1	
74	2529184		SEAT ASSEMBLY	1	
75	2529294		SPACER, Ring, 0.029-0.035 in. thick	un	
75	2529294-1		SPRING, Ring, 0.013-0.017 in. thick	un	
79	367970		VENTURI ASSEMBLY	1	
80	P70249		TUBE, Impact	4	
81	2523511		VENTURI	1	
82	367639		VALVE, Throttle	1	
85	2520920		STOP, Throttle	1	
87	367631		SHAFT ASSEMBLY, Throttle	1	
88	2520886		BODY, Main	1	
90	2526413		STOP, Throttle	1	
91	367725		BUSHING, Sleeve	1	
92	367725		BUSHING, Sleeve	1	
93	384583		INSERT	4	

* - Parts listed above are stocked by Avco Lycoming.

REF. NO.	PART NUMBER	12345	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
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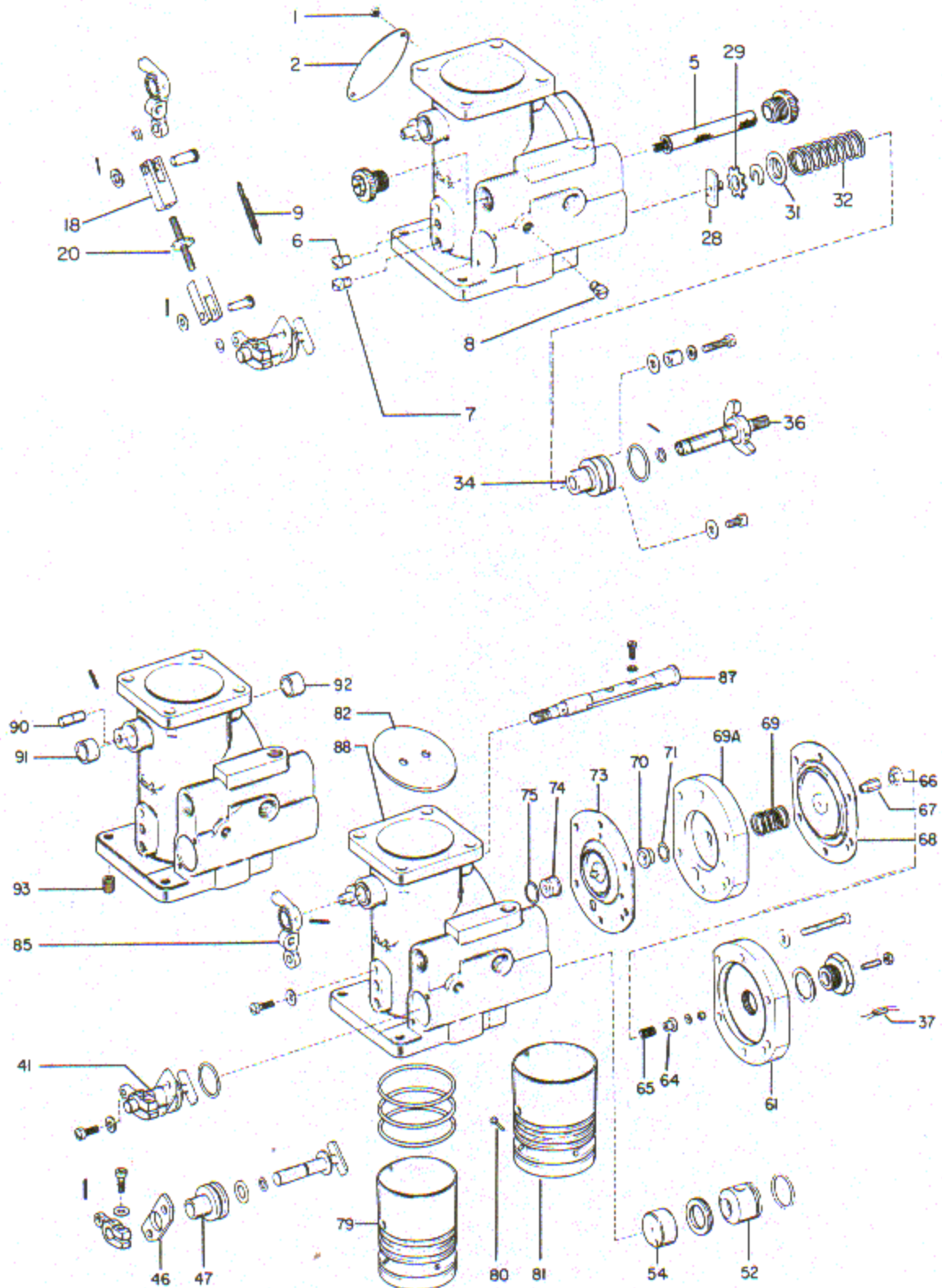


Figure 42

VENDOR SECTION

FUEL INJECTOR (RS10-B1) BENDIX

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	391787-1*	INJECTOR ASSEMBLY, Fuel		
1	367828	PLATE, Identification	1	
2	186739	SCREW, Self-tapping	2	
3	187406	DECAL	1	
4	82887	CAP, Dust and moisture seal	2	
6	55756	PACKING, Preformed	1	
7	69291	FITTING, Fuel outlet	1	
10	55758	PACKING, Preformed	1	
11	367721	FITTING	1	
13	55754	PACKING, Preformed	1	
14	132906	PLUG, Threaded, 7/16 in.-20	1	
15	367507	STRAINER ASSEMBLY	1	
17	2520387	SPRING, Helical, extension	1	
17	2525165	SPRING, Helical, extension	1	
26	367544	LINK	1	
27	367507	SCREW ASSEMBLY, Idle	1	
28	367418	LINK	1	
29	P20513	LEVER, Mixture control	1	
31	187313	NUT, Self-locking, 5/16-24	1	
34	2525318	SPACER	1	
38	379520	PACKING, Preformed	1	
39	2523709	LEVER ASSEMBLY, Mixture control	1	
43	2523888	BUSHING, Mixture control	1	
44	342617	SPRING, Helical, compression	1	
45	31555	PACKING, Preformed	1	
46	2523889	BUSHING, Mixture control	1	
47	367709	SHAFT, Mixture control	1	
51	2523714	LEVER ASSEMBLY, Idle valve	1	
55	2523299	LEVER, Idle valve	1	
56	2522326	PLATE, Idle valve	1	
57	2522327	BUSHING, Idle valve	1	
60	367713	STEM, Idle valve	1	
61	367708	VALVE, Mixture control	1	
62	367386	PACKING, Preformed	1	
63	367629	VALVE, Idle	1	
64	P14573	LEVER	1	
70	367389	VALVE, Throttle	1	
73	367446	LEVER, Stop and idle	1	
75	367416	SHAFT ASSEMBLY, Throttle	1	
76	P61195	PLUG, Taper seat	1	
84	367414	COVER ASSEMBLY	1	
90	367427	WASHER, Diaphragm	1	
91	367436	DIAPHRAGM	1	
95	367412	HOLDER, Spring	1	
101	367726	WASHER, Shim, 0.015 in. thick	un	
	367727	WASHER, Shim, 0.030 in. thick	un	
	367452	WASHER, Shim, 0.060 in. thick	un	
	367791	WASHER, Shim, 0.003 in. thick	un	
102	367492	COVER, Servo	1	
106	367428	WASHER, Diaphragm	1	
107	367760	DIAPHRAGM	1	
109	367438	STEM ASSEMBLY, Servo	1	
110	367410	PIN, Servo bushing	1	
111	31757	PACKING, Preformed	1	
112	367432	LEVER ASSEMBLY, Servo	1	
113	192819	PIN, Lever pivot	1	
115	367429	PACKING, Servo lever	1	

VENDOR SECTION

FUEL INJECTOR (RS10-B1) BENDIX

REF. NO.	PART NUMBER	12345	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
117	367534		BODY ASSEMBLY, Main	1	
118	909198K1		PIN, Spring	1	
119	2520308		BUSHING	2	

* - Parts listed are parts stocked by Avco Lycoming.

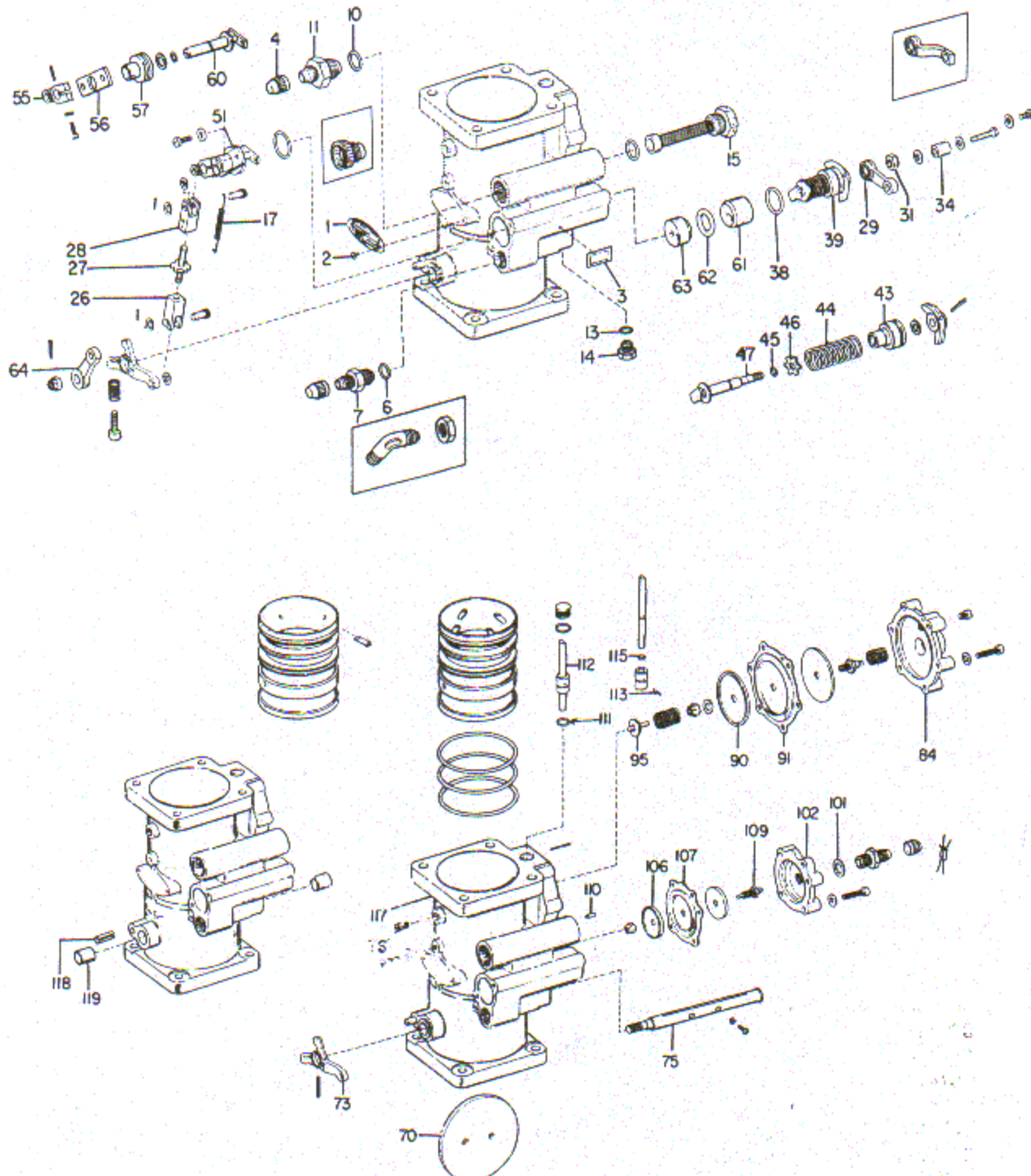


Figure 43

VENDOR SECTION

FUEL INJECTOR (RSA-10AD1) BENDIX

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	2524311-3*	CONTROL ASSEMBLY, Injector	1	
1	367828	PLATE, Identification	1	
2	186739	SCREW, Self-tapping, no.4 x 3/16 in.	2	
3	328617	SEAL	1	
7	P8508	PLUG	1	
8D	2523778	ADAPTER	1	
9	951790	PACKING, Preformed	1	
10	2523903	ADAPTER	1	
11	2523906	STRAINER ASSEMBLY	1	
13	132906	PLUG, 7/16-20	1	
14	951787	PACKING, Preformed	1	
15	P61195	PLUG, Taper seat, 1/4-28	1	
18	2525165	SPRING, Helical, extension	1	
27	2523248	LINK	1	
28	367547	SCREW ASSEMBLY, Idle	1	
29	367544	LINK	1	
30	2523899	LEVER, Mixture control	1	
31	187313	NUT, Self-locking, hex. 5/16-24	1	
33	2525318	SPACER	1	
37	2521757	PLATE, Mixture control	1	
39	2523840	BUSHING, Mixture control	1	
41	367694	HOLDER, Spring	1	
42	2523757	SPRING, Helical, compression	1	
43	2523808	WASHER, Use with 2523539 bushing	1	
45	2523539	BUSHING	1	
45	2520878	BUSHING	1	
48	2522591	LEVER ASSEMBLY, Mixture control	1	
49	2523909	LEVER ASSEMBLY, Idle valve	1	
54	2523299	LEVER, Idle valve	1	
55	909329K35	PIN, Spring	1	
56	2522326	PLATE, Idle valve	1	
57	2526408	BUSHING, Idle valve	1	
60	2523986	STEM, Idle valve	1	
61	951400	PACKING, Preformed	1	
63	2525196	VALVE, Mixture control	1	
64	2525494	PACKING Preformed	1	
65	2525229	VALVE, Idle	1	
68	365533	GASKET	1	
70	2523502	COVER, Regulator	1	
73	2529181	CUP, Retainer	1	
74	2523387	SPRING, Helical, compression	1	
75	2529182	BUSHING	1	
76	2529183	BUSHING	1	
77	2529470	DIAPHRAGM ASSEMBLY, Regulator	1	
78	2523247	SPRING, Helical, compression	1	
79	2523507	BODY, Regulator	1	
81	2529188	BUSHING ASSEMBLY, Regulator	1	
82	2523471	DIAPHRAGM ASSEMBLY, Fuel regulator	1	
83	2523471	SEAT, Regulator valve	1	
86	2523471	PACKING, Preformed	3	
87	2523471	VENTURI ASSEMBLY	1	
		TUBE	4	
	2523471	VENTURI	1	
88	2523471	VALVE, Throttle	1	
91	2521196	LEVER	1	

VENDOR SECTION

FUEL INJECTOR (RSA-10AD1) BENDIX

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
		1 2 3 4 5		
94	900452K1	BOLT, 1/4-28 x 3/4 in.	1	
95	P60219	SPRING, Helical compression	1	
96A	2523911	STOP, Throttle	1	
98	367416	SHAFT ASSEMBLY, Throttle	1	
99	2525928	BODY ASSEMBLY, Main	1	
100	2525969	STOP ASSEMBLY	1	
102	2521918	BUSHING, Sleeve	2	

* - Parts listed are parts stocked by Avco Lycoming.

** - Not illustrated.

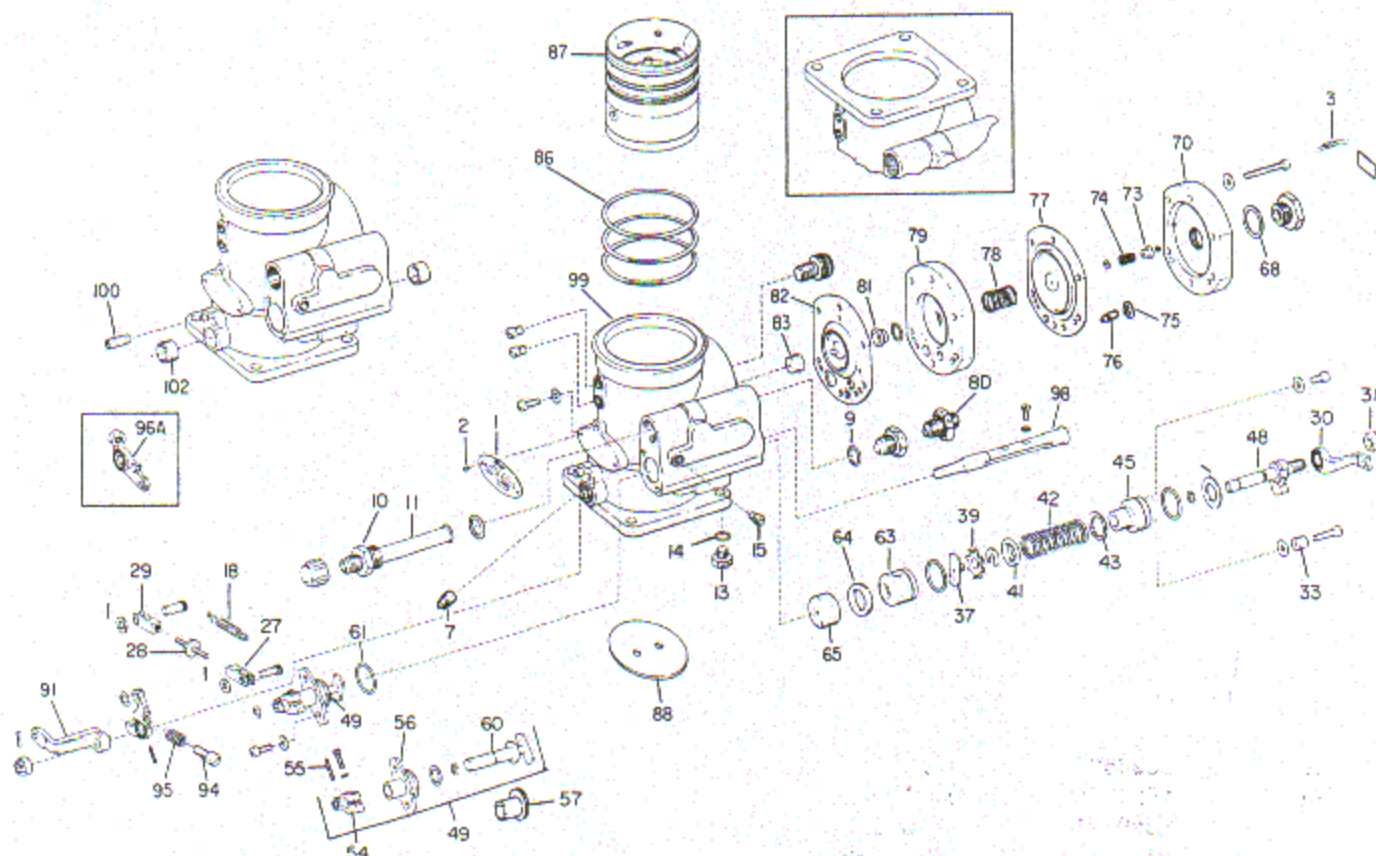


Figure 44

VENDOR SECTION

FUEL INJECTOR (RS-10ED1) BENDIX

REF. NO.	PART NUMBER	12345	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	391821-2*		INJECTOR ASSEMBLY	1	A
	2524470-1*		INJECTOR ASSEMBLY	1	B
1	367828		PLATE, Identification	1	
2	186739		SCREW, Self-tapping	2	
3	187406		DECAL	1	
4	133176		PLUG, Machine thread	1	
14	367507		STRAINER ASSEMBLY	1	
15	557S8		PACKING, Preformed	1	
16	2525165		SPRING, Helical, extension	1	
25	367544		LINK	1	
28	P20513		LEVER, Mixture control	1	A
29	2521287		LEVER, Mixture control	1	B
33	2525318		SPACER	1	
37	379S20		PACKING, Preformed	1	
38	2523709		LEVER ASSEMBLY, Mixture control	1	
42	2523888		BUSHING	1	
43	342617		SPRING, Helical, compression	1	
45	2523889		BUSHING	1	
46	367709		SHAFT, Mixture control	1	
50	2523714		LEVER ASSEMBLY, Idle valve	1	
54	2523299		LEVER, Idle valve	1	
55	2522326		PLATE, Idle	1	
56	2522327		BUSHING	1	
59	367713		STEM, Idle valve	1	
60	367708		VALVE, Mixture control	1	
62	367629		VALVE, Idle	1	
64	P60219		SPRING, Helical, compression	1	
65	328617		SEAL, Aluminum	1	
67	367414		COVER ASSEMBLY	1	
70	367434		SPRING, Helical compression	1	
73	367427		WASHER, Diaphragm	2	
74	367436		DIAPHRAGM	1	
76	367406		SCREW, Diaphragm	1	
77	367433		SPRING, Helical, compression	1	
78	367412		HOLDER, Spring	1	
81	379S13		PACKING, Preformed	1	
83	317S7		PACKING, Preformed	1	
84	367432		LEVER ASSEMBLY, Servo	1	
93	2520597		COVER ASSEMBLY, Distributor	1	
94	367632		VALVE ASSEMBLY	1	
95	367640		SPRING, Helical, compression	1	
98	367758		DIAPHRAGM ASSEMBLY	1	
99	367649		SPRING, Helical, compression	1	
100	367665		SEAT	1	
103	P9201-72		BLEED	1	
104	367764		SPACER, Distributor valve	1	
106	367428		WASHER, Diaphragm	1	
107	367760		DIAPHRAGM	1	
109	367438		STEM ASSEMBLY, Servo	1	
113	366198		PACKING, Preformed	1	
114	367967		VENTURI ASSEMBLY	1	
115	367539		TUBE	4	
117	390248		LEVER	1	
121	367389		VALVE, Throttle	1	
124	367446		LEVER, Stop and idle	1	

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VENDOR SECTION

FUEL INJECTOR (RS-10ED1) BENDIX

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
126	367416	SHAFT ASSEMBLY, Throttle	1	
127	2520601	BODY ASSEMBLY, Main	1	
129	2520308	BUSHING	2	
131	391680	STUD	4	

* - Parts listed are parts stocked by Avco Lycoming.

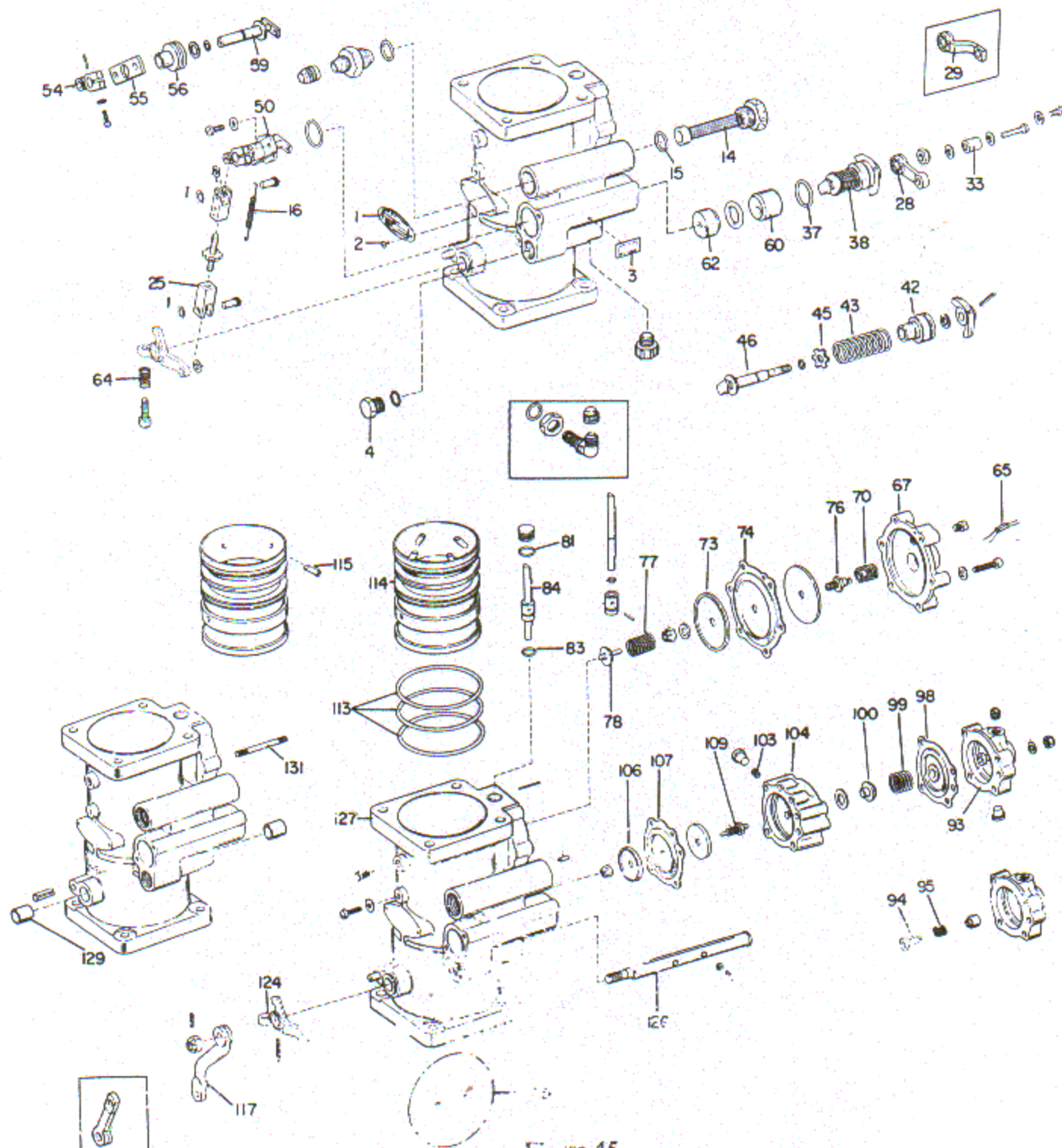


Figure 45

VENDOR SECTION

FUEL INJECTOR (RSA-10ED1) BENDIX

REF. NO.	PART NUMBER	12345	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
1	367756*		PLATE, Identification	1	
2	186739		SCREW, Self-tapping	2	
5	2523906		STRAINER ASSEMBLY, Fuel inlet	1	
6	P61195		PLUG, Taper seat	1	
7	P9201-75		JET, Metering	1	
11	2523959		BOLT, Special	1	
12	2523979		SCREEN	1	
13	339667		RING, Retaining	1	
16	2523994		BODY, Impact tube	1	
17	2523995		PLUG, Venturi	1	
18	P9201-65		JET, Metering	1	
19	2523969		HOUSING, Venturi	1	
20	2525165		SPRING, Helical, extension	1	
29	367S44		LINK	1	
34	2525318		SPACER	1	
39	2521757		PLATE, Mixture control	1	
40	2523840		BUSHING, Mixture control stem	1	
42	367694		HOLDER, Spring	1	
43	2523757		SPRING, Helical, compression	1	
47	2522591		LEVER ASSEMBLY, Mixture control	1	
48	328617		SEAL, Aluminum	1	
52	2526084		LEVER ASSEMBLY, Idle valve	1	A, B, C, D, F
52	2537428		LEVER ASSEMBLY, Idle valve	1	E, G
56	2523299		LEVER	1	
57	2522326		PLATE	1	
58	2526408		BUSHING	1	
61	2523990		STEM	1	A, B, C, D, F
61	2537427		STEM	1	E, G
63	2525196		VALVE, Mixture control	1	
64	2537665		VALVE, Lower idle	1	A, B, C, F
64	2529450		VALVE, Lower idle	1	E, G
64	2525236		VALVE, Lower idle	1	D
69	365533		GASKET	1	
76	2529181		HOLDER, Spring	1	
77	2523155		SPRING, Helical, compression	1	
78	2529182		BUSHING	1	
79	2529183		BUSHING	1	
80	2529298		DIAPHRAGM ASSEMBLY, Air	1	
81	2523688		SPRING, Helical	1	
82	2529296		BUSHING ASSEMBLY, Regulator	1	
84	2529293		DIAPHRAGM ASSEMBLY, Fuel	1	
85	2529184		SEAT ASSEMBLY, Regulator valve	1	
86	2529294		SHIM	un	
87	2523910		VALVE, Throttle	1	
90	2523800		STOP, Throttle	1	
92	367416		SHAFT ASSEMBLY, Throttle	1	
93	2525000		BODY ASSEMBLY, Main	1	A, B, C, E, F, G
93A	2523966		BODY ASSEMBLY, Main	1	D
95	2523413		STOP ASSEMBLY, Throttle	1	
96	2521912		BEARING SLEEVE	1	
97	2521126		BEARING SLEEVE	1	

* - Parts listed are stocked by Avco Lycoming.

VENDOR SECTION

FUEL INJECTOR (RSA-10ED1) BENDIX

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	12345			

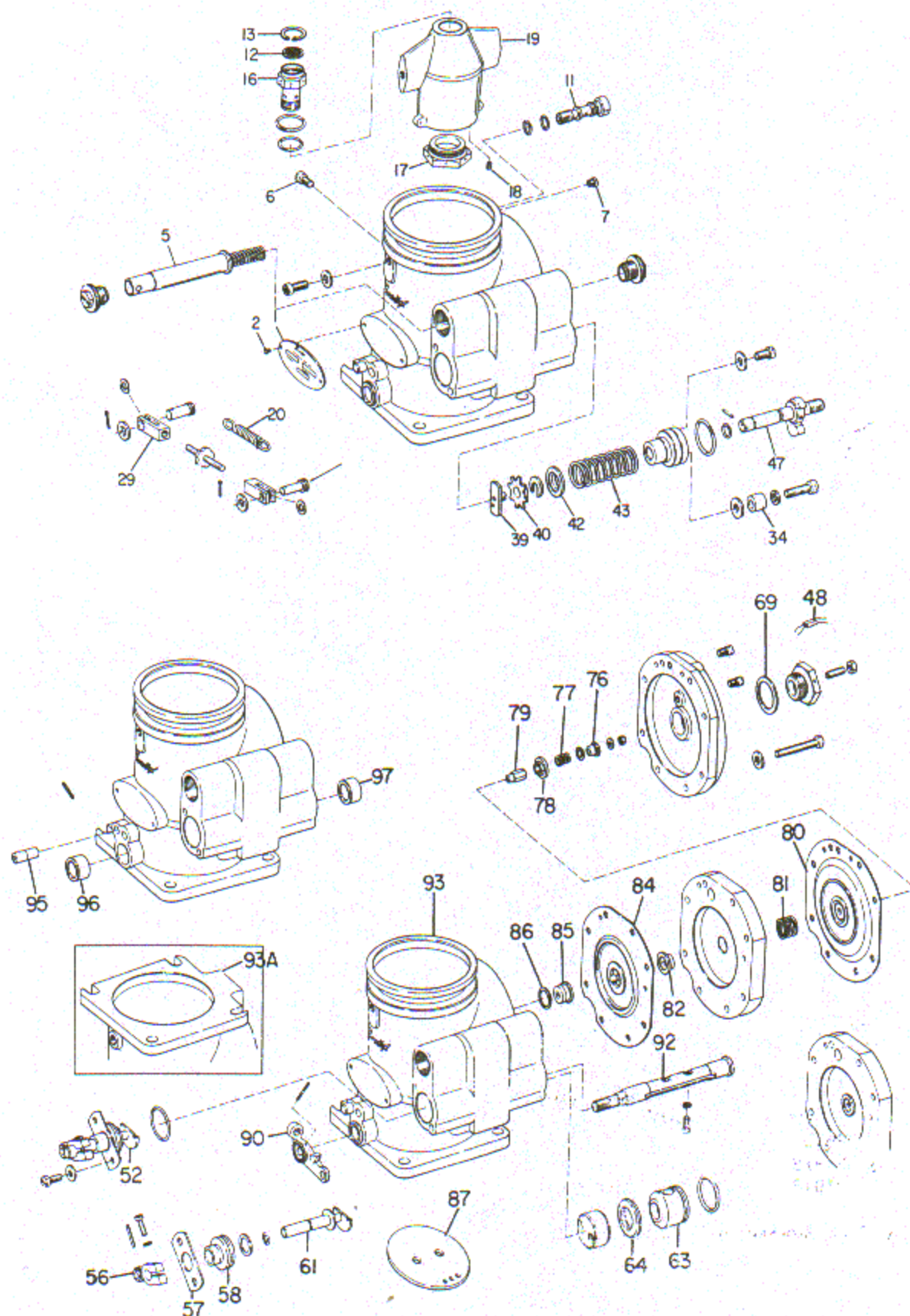
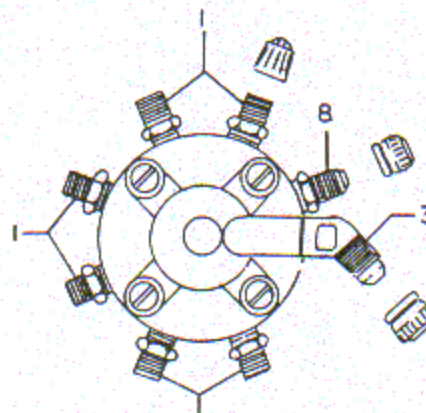
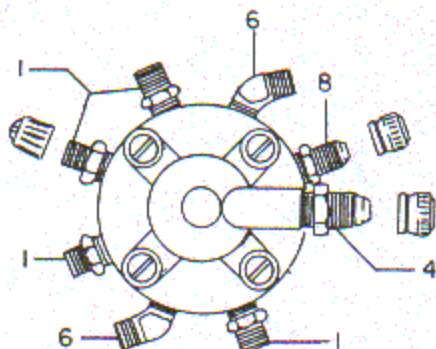
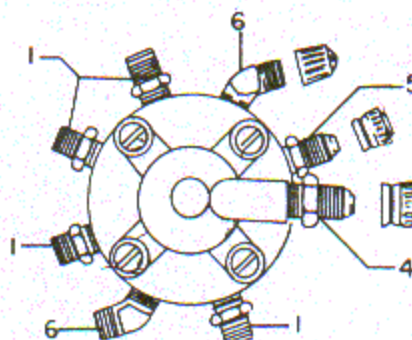
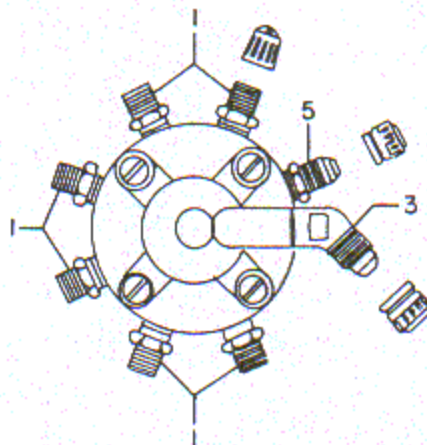
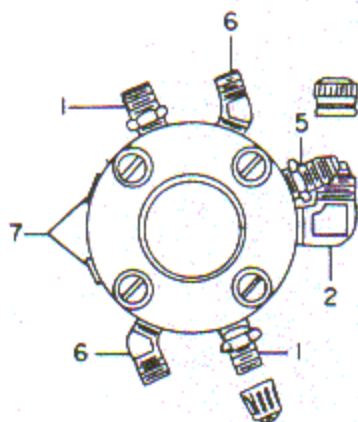


Figure 47

VENDOR SECTION
FUEL MANIFOLD ASSEMBLY

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	2524188-1*	MANIFOLD ASSEMBLY, Fuel	1	A
	2524223-1	MANIFOLD ASSEMBLY, Fuel	1	B
	2524240-1	MANIFOLD ASSEMBLY, Fuel	1	C
	2524416-1	MANIFOLD ASSEMBLY, Fuel	1	D
	2524421-1	MANIFOLD ASSEMBLY, Fuel	1	E
1	367718	UNION, Nipple	2	A
	367718	UNION, Nipple	6	B, E
	367718	UNION, Nipple	4	C, D
2	365046	FITTING, 90°	1	A
3	366082	FITTING, 45°	1	B, E
4	367747	FITTING	1	D
5	2521214	ADAPTER, Pressure gage	1	B, C
6	393401	FITTING, Elbow, 45°	2	A, C, D
7	392522	PLUG	2	A
8	2522266	ADAPTER ASSEMBLY	1	D, E

* - Parts listed above are stocked by Avco Lycoming.

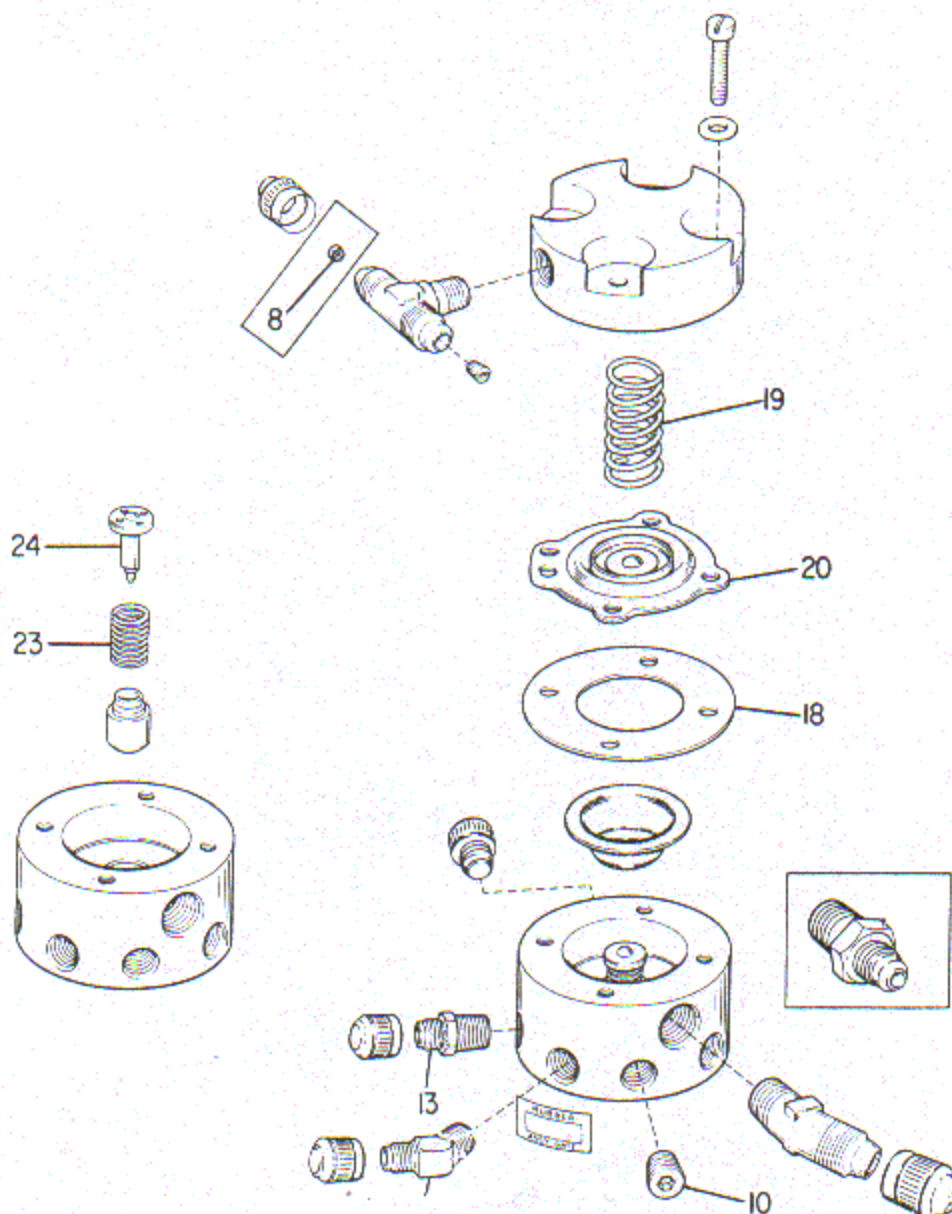


VENDOR SECTION

DIST. VALVE ASSEMBLY

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	391806-3*	VALVE ASSEMBLY, Distributor	1	
8	367990	SCREEN, Electro plate	1	
10	392522	PLUG	1	
13	367718	NIPPLE, Union	1	
14	393401	ELBOW, 45°	5	
18	367755	GASKET, Distributor valve	1	
19	367649	SPRING, Helical, compression	1	
20	2521721	DIAPHRAGM ASSEMBLY, Pump	1	
23	367640	SPRING, Helical, compression	1	
24	367632	VALVE ASSEMBLY	1	

* - Parts listed above are stocked by Avco Lycoming.



SERVICE KIT SECTION

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
<i>IO-540-B and -E Series Engines</i>				
	73186-1	Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter exhaust valve, chrome cylinder barrel, plain rings, 4-ring piston)	1	
1	60009	KEY, Valve	2	
2	62922	SEAL, Shroud tube	4	
3	66732	GASKET, Valve rocker shaft cover	2	
4	67113	ROCKER ASSEMBLY, Intake valve	1	
5	68325	SEAT, Valve spring lower	1	
6	68326	SPRING, Valve outer	2	
7	LW-10077	SEAT, Valve spring	1	
8	68328	SPRING, Valve, auxiliary	2	
9	69650	PIN, Piston	1	
10	71450	GASKET, Rocker box cover	1	
11	71481	RING, Oil seal	1	
12	71549	WASHER, Valve rocker	2	
13	74673	RING, Piston, plain	3	
14	72198	PLUG, Piston pin (alum. bronze)	2	
15	72242	COVER ASSEMBLY, Rocker box	1	
16	72454	RING, Piston, oil regulating, plain	1	
17	72626	SHAFT, Valve rocker	1	
18	72630	ROCKER ASSEMBLY, Exhaust valve	1	
19	72709	SCREW	4	
20	72710	COVER, Valve rocker shaft	2	
21	73111	VALVE, Exhaust, rotator type	1	
22	72112	SEAT, Valve spring, lower	1	
23	LW-10076	SEAT, Valve spring, rotator type	1	
24	73117	VALVE, Intake	1	
25	73264	PISTON, Comp. ratio 8.7:1 (4-ring)	1	
26	76189	CYLINDER AND HEAD ASSEMBLY (Chrome)	1	
27	MS-13997-3	KEY, Valve, rotator type	2	
28	MS-13998-3	CAP, Valve stem, exhaust	1	
29	STD-1925	SCREW, Fill. hd., self-locking	9	
30	STD-1215	BOLT	2	
31	60828	PLUG, Piston pin (aluminum) alternate	2	
	73601-1	Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter exhaust valve, nitrided cylinder barrel, chrome plated, half-wedge rings, 4-ring piston)	1	
6	LW-11796	SPRING, Valve outer	2	
8	LW-11797	SPRING, Valve, auxiliary	2	
13	74241	RING, Piston, chrome (half-wedge)	1	
16	69457	RING, Piston, oil regulating (chrome)	3	
26	76190	CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
	77326	Kit, Cylinder, Piston and Ring Assembly (Nitrided cylinder barrel, chrome-plated, half-wedge rings, 3-ring piston)	1	
6	LW-11796	SPRING, Valve, outer	2	
8	LW-11797	SPRING, Valve, auxiliary	2	
13	74241	RING, Piston, chrome	2	

SERVICE KIT SECTION

REF. NO.	PART NUMBER	1 2 3 4 5	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
16	73857		RING, Piston, oil regulating, chrome	1	
25	LW-10207-S		PISTON, Comp. ratio 8.7:1 (3-ring)	1	
26	73949		CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
	76190		CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
	77328		Kit, Cylinder, Piston and Ring Assembly (Chrome cylinder barrel, plain rings, 3-ring piston)	1	
6	LW-11796		SPRING, Valve, outer	2	
8	LW-11797		SPRING, Valve, auxiliary	2	
16	73998		RING, Piston, oil regulating, plain	1	
25	LW-10207-S		PISTON, Comp. ratio 8.7:1 (3-ring)	1	
	77329		Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter inconel exhaust valve, nitrided cylinder barrel, chrome half-wedge rings, 3-ring piston)	1	
6	LW-11796		SPRING, Valve, outer	2	
8	LW-11797		SPRING, Valve, auxiliary	2	
13	74241		RING, Piston, chrome	2	
16	73857		RING, Piston, oil regulating, chrome	1	
21	74802		VALVE, Exhaust, rotator type, inconel	1	
25	LW-10207-S		PISTON, Comp. ratio 8.7:1 (3-ring)	1	
26	74562		CYLINDER AND HEAD ASSEMBLY (Nitrided)	1	
	75163		CYLINDER AND HEAD ASSEMBLY (Nitrided)	1	
	77330		Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter inconel exhaust valve, chrome cylinder barrel, plain rings, 3-ring piston)	1	
6	LW-11796		SPRING, Valve, outer	2	
8	LW-11797		SPRING, Valve, auxiliary	2	
16	73998		RING, Piston, oil regulating, plain	1	
21	74802		VALVE, Exhaust, rotator type, inconel	1	
25	LW-10207-S		PISTON, Comp. ratio 8.7:1 (3-ring)	1	
26	74561		CYLINDER AND HEAD ASSEMBLY, Chrome	1	
	76185		CYLINDER AND HEAD ASSEMBLY, Chrome	1	
<i>IO-540-A and -G Series, -K1A5, -K1B5, -K1D5</i>					
	73601-2		Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter exhaust valve, nitrided cylinder barrel, chrome plated half-wedge rings, 4-ring piston)	1	
6	LW-11796		SPRING, Valve, outer		
8	LW-11797		SPRING, Valve, auxiliary		
10	67193		GASKET, Rocker box cover	1	
13	74241		RING, Piston, chrome	2	
15	68795		COVER ASSEMBLY, Rocker box	1	
16	69457		RING, Piston, oil regulating, chrome	1	
18	67112		ROCKER ASSEMBLY, Exhaust valve	1	
20	66731		COVER, Valve rocker shaft	2	

SERVICE KIT SECTION

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	12345			
26	73948	CYLINDER AND HEAD ASSEMBLY (Nitrided)	1	
	STD-160	WASHER, Internal lock, 1/4 in.	4	
	STD-1411	NUT, Plain, 1/4-20	4	
	74039	Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter exhaust valve, chrome cylinder barrel, plain half-wedge rings, 4-ring piston)	1	
6	LW-11796	SPRING, Valve, outer	2	
8	LW-11797	SPRING, Valve, auxiliary	2	
10	67193	GASKET, Rocker box cover	1	
15	68795	COVER ASSEMBLY, Rocker box	1	
18	67112	ROCKER ASSEMBLY, Exhaust valve	1	
20	66731	COVER, Valve rocker shaft	1	
26	74507	CYLINDER AND HEAD ASSEMBLY, Chrome	1	
	STD-160	WASHER, Internal lock, 1/4 in.	4	
	STD-1411	NUT, Plain, 1/4-20	4	
	75047	Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter inconel exhaust valve, chrome cylinder barrel, plain half-wedge rings, 4-ring piston)	1	
6	LW-11796	SPRING, Valve, outer	2	
8	LW-11797	SPRING, Valve, auxiliary	2	
10	67193	GASKET, Rocker box cover	1	
15	68795	COVER ASSEMBLY, Rocker box	1	
18	67112	ROCKER ASSEMBLY, Exhaust valve	1	
20	66731	COVER, Valve rocker shaft	2	
21	74802	VALVE, Exhaust, rotator type (inconel)	1	
26	74564	CYLINDER AND HEAD ASSEMBLY, Chrome	1	
	STD-160	WASHER, Internal lock, 1/4 in.	4	
	STD-1411	NUT, Plain, 1/4-20	4	
	75048	Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter inconel exhaust valve, nitrided cylinder barrel, chrome plated half-wedge rings, 4-ring piston)	1	
6	LW-11796	SPRING, Valve, outer	2	
8	LW-11797	SPRING, Valve, auxiliary	2	
10	67193	GASKET, Rocker box cover	1	
13	74241	RING, Piston, chrome plated	3	
16	69457	RING, Piston, oil regulating, chrome	1	
18	67112	ROCKER ASSEMBLY, Exhaust valve	1	
20	66731	COVER, Valve rocker shaft	2	
21	74802	VALVE, Exhaust, rotator type (inconel)	1	
26	74563	CYLINDER AND HEAD ASSEMBLY (Nitrided)	1	
	STD-160	WASHER, Internal lock, 1/4 in.	4	
	STD-1411	NUT, Plain, 1/4-20	4	
	75049	Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter inconel exhaust valve chrome cylinder barrel, plain rings, 4-ring piston)	1	

SERVICE KIT SECTION

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
		1 2 3 4 5		
6	LW-11796	SPRING, Valve, outer	2	
8	LW-11797	SPRING, Valve, auxiliary	2	
21	74802	VALVE, Exhaust, rotator type, inconel	1	
26	74561	CYLINDER AND HEAD ASSEMBLY, Chrome	1	
	76185	CYLINDER AND HEAD ASSEMBLY, Chrome	1	
	75050	Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter inconel exhaust valve, nitrided cylinder barrel, chrome plated half-wedge rings, 4-ring piston)	1	
6	LW-11796	SPRING, Valve, outer	2	
8	LW-11797	SPRING, Valve, auxiliary	2	
13	74241	RING, Piston, chrome	3	
16	69457	RING, Piston, oil regulating, chrome	1	
21	74802	VALVE, Exhaust, rotator type, inconel	1	
26	74562	CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
	75163	CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
	77322	Kit, Cylinder, Piston and Ring Assembly (Nitrided cylinder barrel, chrome plated half-wedge rings, 3-ring piston)	1	
6	LW-11796	SPRING, Valve, outer	2	
8	LW-11797	SPRING, Valve, auxiliary	2	
10	67193	GASKET, Rocker box cover	1	
13	74241	RING, Piston, chrome	2	
15	68795	COVER ASSEMBLY, Rocker box	1	
16	73857	RING, Piston, oil regulating, chrome	1	
18	67112	ROCKER ASSEMBLY, Exhaust valve	1	
20	66731	COVER, Valve rocker shaft	2	
25	LW-10207-S	PISTON, Comp. ratio 8.7:1 (3-ring)	1	
26	73948	CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
	STD-160	WASHER, Internal lock, 1/4 in.	4	
	STD-1411	NUT, Plain, 1/4-20	4	
	77323	Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter inconel exhaust valve, nitrided cylinder barrel, chrome plated half-wedge rings, 3-ring piston)	1	
6	LW-11796	SPRING, Valve, outer	2	
8	LW-11797	SPRING, Valve, auxiliary	2	
10	67193	GASKET, Rocker box cover	1	
13	74241	RING, Piston, chrome	2	
16	73857	RING, Piston, oil regulating, chrome	1	
18	67112	ROCKER ASSEMBLY, Exhaust valve	1	
20	66731	COVER, Valve rocker shaft	2	
21	74802	VALVE, Exhaust, rotator type, inconel	1	
25	LW-10207-S	PISTON, Comp. ratio 8.7:1 (3-ring)	1	
26	74563	CYLINDER AND HEAD ASSEMBLY	1	
	STD-160	WASHER, Internal lock, 1/4 in.	4	
	STD-1411	NUT, Plain, 1/4-20	4	

SERVICE KIT SECTION

REF. NO.	PART NUMBER	12345	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	77324		Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter exhaust valve, chrome cylinder barrel, plain half-wedge rings, 3-ring piston)	1	
6	LW-11796		SPRING, Valve, outer	2	
8	LW-11797		SPRING, Valve, auxiliary	2	
10	67193		GASKET, Rocker box cover	1	
16	73998		RING, Piston, oil regulating, plain	1	
18	67112		ROCKER ASSEMBLY, Exhaust valve	1	
20	66731		COVER, Valve rocker shaft	2	
25	LW-10207-S		PISTON, Comp. ratio 8.7:1 (3-ring)	1	
26	74507		CYLINDER AND HEAD ASSEMBLY, Chrome	1	
	STD-160		WASHER, Internal lock, 1/4 in.	4	
	STD-1411		NUT, Plain, 1/4-20	4	
	77325		Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter inconel exhaust valve chrome cylinder barrel, plain half-wedge rings, 3-ring piston)	1	
6	LW-11796		SPRING, Valve, outer	2	
8	LW-11797		SPRING, Valve, auxiliary	2	
10	67193		RING, Piston, oil regulating, plain	1	
18	67112		ROCKER ASSEMBLY, Exhaust valve	1	
20	66731		COVER, Valve rocker shaft	2	
21	74802		VALVE, Exhaust, rotator type, inconel	1	
25	LW-10207-S		PISTON, Comp. ratio 8.7:1 (3-ring)	1	
26	74564		CYLINDER AND HEAD ASSEMBLY, Chrome	1	
<i>IO-540-C Series</i>					
	75406		Kit, Cylinder, Piston and Ring Assembly, Chrome	1	
1	60009		KEY, Valve, intake	2	
2	62922		SEAL, Shroud tube	2	
3	60401		SHAFT, Valve rocker	1	
4	75906		GASKET, Rocker box cover	1	
5	61247		COVER, Rocker box	1	
6	LW-11800		SPRING, Valve, outer	2	
7	65441		SEAT, Valve spring lower, intake	1	
8	LW-11795		SPRING, Valve, inner	2	
9	LW-10077		SEAT, Valve spring upper, intake	1	
10	68517		SPRING, Shroud tube	2	
11	68518		LOCKPLATE, Shroud tube	1	
12	69245		SPACER, Shroud tube spring	1	
13	63656		ROCKER ASSEMBLY, Valve, intake	1	
14			PIN, Piston	1	
15			SEAL, Shroud tube	2	
16	71481		RING, Oil seal	1	
17	74673		RING, Piston, compression, plain	2	
18	72198		PLUG, Piston pin (aluminum bronze)	2	
19	73998		RING, Piston, oil regulating, plain	1	
20	75089		PISTON, Comp. ratio 8.5:1 (3-ring)	1	
21	LW-10076		SEAT, Valve spring upper, exhaust rotator type	1	
22	73938		VALVE, Intake	1	

SERVICE KIT SECTION

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	12345			
23	74541	VALVE, Exhaust, rotator type	1	
24	74554	SEAT, Valve spring lower, exhaust	1	
25	74636	ROCKER ASSEMBLY, Valve, exhaust	1	
26	74925	CYLINDER AND HEAD ASSEMBLY, Chrome	1	
27	STD-1215	BOLT	2	
28	60828	PLUG, Piston pin, aluminum	2	
29	STD-1411	NUT, Plain, 1/4-20	1	
30	STD-1925	SCREW, 1/4-20 x 5/8 in. long	6	
31	MS-13997-3	KEY, Valve exhaust, rotator type	2	
32	MS-13998-3	CAP, Valve exhaust, rotator type	1	
33	1102	PLUG, 1/8 in. pipe x 3/8 in. long	1	
<i>10-540-C Series, -D4A5, -N1A5</i>				
	75407	Kit, Cylinder, Piston and Ring Assembly, Nitrided	1	
17	74241	RING, Piston, compression, chrome	2	
19	73857	RING, Piston, oil regulating, chrome	1	
26	74924	CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
	76450	Kit, Cylinder, Piston and Ring Assembly, Nitrided	1	
17	74241	RING, Piston, compression, chrome	2	
19	73857	RING, Piston, oil regulating, chrome	1	
23	76081	VALVE, Exhaust, rotator type	1	
26	76087	CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
34	STD-1874	SCREW, Fill. hd., self-locking, 1/4-20 x 13/16 in. long	2	
<i>10-540-G1A5, -G1B5, -G1E5, -K1C5, -K1E5, -P1A5</i>				
	78531	Kit, Cylinder, Piston and Ring Assembly (1/2 in. stem diameter inconel exhaust valve, nitrided long reach cylinder, chrome half-wedge rings, 3-ring piston)	1	
1	60009	KEY, Valve	2	
2	60828	PLUG, Piston pin	2	
3	62922	SEAL, Shroud tube	4	
4	66731	COVER, Valve rocker shaft	2	
5	66732	GASKET, Valve rocker shaft cover	2	
6	67112	ROCKER ASSEMBLY, Valve, exhaust	1	
7	67113	ROCKER ASSEMBLY, Valve, intake	1	
8	67193	GASKET, Rocker box cover	1	
9	68325	SEAT, Valve spring lower	1	
10	LW-11796	SPRING, Valve, outer	2	
11	LW-10077	SEAT, Valve spring	1	
12	LW-11797	SPRING, Valve, auxiliary	1	
13	68795	COVER ASSEMBLY, Rocker box	1	
14	72626	SHAFT, Valve rocker	2	
15	73857	RING, Piston, oil regulating, chrome	1	
16	69650	PIN, Piston	1	
17	71481	RING, Oil seal	1	
18	71549	WASHER, Valve rocker	2	
19	74241	RING, Piston, compression, chrome	2	
20	74802	VALVE, Exhaust, rotator type, inconel	1	

SERVICE KIT SECTION

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	12345			
21	73112	SEAT, Valve spring, lower	1	
22	LW-10076	SEAT, Valve spring, rotator type	1	
23	73117	VALVE, Intake	1	
24	LW-10207-S	PISTON, Comp. ratio 8.7:1 (3-ring)	1	
25	75717	CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
26	MS-13997-3	KEY, Valve, rotator type	2	
27	MS-13998-3	CAP, Valve stem	1	
28	STD-160	WASHER, Internal lock, 1/4 in.	4	
29	STD-1411	NUT, Plain, 1/4-20	4	
30	STD-1925	SCREW, Fill. hd., self-locking	9	
31	STD-1215	BOLT	2	
	LW-11788	Kit, Cylinder, Piston and Ring Assembly, Chrome (1/2 in. stem diameter inconel exhaust valve, chrome long reach cylinder barrel, plain half-wedge rings, 3-ring piston)	1	
15	73998	RING, Piston, oil regulating, plain	1	
19	74673	RING, Piston, compression, plain	2	
25	LW-10800	CYLINDER AND HEAD ASSEMBLY, Chrome	1	
<i>IO-540-M1A5</i>				
	LW-11696	Kit, Cylinder, Piston and Ring Assembly, Nitrided (1/2 in. stem diameter inconel exhaust valve, nitrided long reach cylinder, chrome half-wedge rings, 3-ring piston)	1	
4	72710	COVER, Valve rocker shaft	2	
6	72630	ROCKER ASSEMBLY Valve, exhaust	1	
8	71450	GASKET, Rocker box cover	1	
13	72242	COVER ASSEMBLY, Rocker box	1	
25	75419	CYLINDER AND HEAD ASSEMBLY, Nitrided	1	
32	72709	SCREW, 1/4-20 x 5/8 in. long	4	
<i>IO-540-C, -D Series, -J4A5, -P1A5</i>				
	71569-1	Seal and Gasket Set	1	
1	STD-111	GASKET, 1.00 ID x 1-1/4 in. OD x 3/32 in. thick	1	
2	STD-208	SEAL, Oil	2	
3	STD-213	SEAL, Oil	1	
4	STD-294	GASKET, Annular	2	
5	72075	RING, Oil seal	8	
6	72091	RING, Oil seal	2	
7	STD-1045	GASKET, Annular	1	
8	72053	GASKET, Governor	1	
9	1691-C	GASKET, Fuel pump	1	
10	72220	GASKET, Oil level gage	1	
11	62922	SEAL, Shroud tube	12	
12	60096	GASKET, Fuel pump	1	
13	71973	GASKET, Two bolt flange	6	
14	77877	SEAL, Crankshaft oil	1	
15	61165	SEAL, Tachometer drive oil	1	
16	61173	GASKET, Oil pressure housing	1	
17	61183	GASKET, Accessory adapter	1	

SERVICE KIT SECTION

REF. NO.	PART NUMBER	1 2 3 4 5	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
18	75906-S		GASKET, Rocker box cover	6	
19	73818		GASKET, Accessory housing	1	
20	62224		GASKET, Magneto adapter	4	
21	66224		GASKET, Carburetor	1	
22	72812		GASKET, Oil sump	1	
23	68315		GASKET, Accessory drive adapter	1	
24	69164		GASKET, Fuel pump adapter	1	
25	69551		GASKET, Accessory drive adapter	1	
26	70310		SEAL, Shroud tube	12	
27	70455		GASKET, 25/32 ID x 1-1/4 OD x 3/32 in. thick	1	
28	71481		RING, Oil seal	6	
29	8313		GASKET, Vacuum pump	2	
30	67516		LOCKPLATE, Crankshaft gear	1	
31	71646		LOCKPLATE, Crankshaft idler gear shaft	2	
32	72078		LOCKPLATE, Camshaft gear	2	
33	68518		LOCKPLATE, Shroud tube	6	
34	71667		LOCKPLATE, Fuel pump idler gear shaft	1	
35	73383		LOCKPLATE, Generator bracket	2	
36	76691		GASKET, Oil filter adapter	1	
37	72059		GASKET, Oil level gage	1	
38	72312		RING, Oil seal	1	
39	78292		GASKET, Magneto	2	
40	70457		GASKET, Oil filler extension	1	
41	72210		GASKET, Air throttle housing	1	
42	74305		SEAL, Crankshaft oil	1	
43	76510		GASKET, Oil cooler bypass valve	1	
44	78443		SEAL, Crankshaft oil	1	
<i>IO-540-A, -B, -E, -G, -K Series, -M1A5, -N1A5, -R1A5</i>					
	73185-1		Seal and Gasket Set	1	
1	STD-1045		GASKET, Annular	1	
2	77377		SEAL, Crankshaft oil	1	
3	72075		SEAL, Oil	8	
4	72091		RING, Oil seal	2	
5	70455		GASKET, Governor driven gear	1	
6	72053		GASKET, Governor	1	
7	STD-1441		GASKET, Annular	6	
8	62922		SEAL, Shroud tube	24	
9	71481		RING, Oil seal	6	
10	66732		GASKET, Valve rocker shaft cover	12	
11	71450		GASKET, Rocker box cover	6	
12	73818		GASKET, Accessory housing	1	
13	61165		SEAL, Oil, tachometer drive	1	
14	STD-294		GASKET, Annular	2	
15	72812		GASKET, Oil sump	1	
16	STD-111		GASKET, 1.00 ID x 1-1/4 in. OD x 3/32 thick	1	
17	72711		RING, Oil seal, intake pipe	6	
18	71973		GASKET, Intake pipe	6	
19	70457		GASKET, Oil filler extension	1	
20	72220		GASKET, Oil level gage	1	
21	62224		GASKET, Magneto adapter	4	
22	61173		GASKET, Oil pressure housing	1	
23	61183		GASKET, Accessory adapter	1	

SERVICE KIT SECTION

REF. NO.	PART NUMBER	DESCRIPTION	QTY. PER ENG.	MODEL USAGE
	1 2 3 4 5			
24	STD-208	SEAL, Oil, vacuum pump adapter	1	
25	72210	GASKET, Air throttle housing	1	
26	1691-C	GASKET, Fuel pump	1	
27	73032	GASKET, Air inlet housing	1	
28	67193	GASKET, Rocker box cover	6	
29	67516	LOCKPLATE, Crankshaft gear	1	
30	72078	LOCKPLATE, Camshaft gear	2	
31	73383	LOCKPLATE, Generator bracket	2	
32	71667	LOCKPLATE, Fuel pump, idler gear shaft	1	
33	71646	LOCKPLATE, Crankshaft idler gear	2	
34	76691	GASKET, Oil filter adapter	1	
35	74305	SEAL, Crankshaft oil	1	
36	76510	GASKET, Oil cooler bypass valve	1	
37	75233	"O"-RING	24	
38	78443	SEAL, Crankshaft oil	1	
39	78292	GASKET, Magneto	2	
40	8313	GASKET, Vacuum pump	2	
41	69164	GASKET, Fuel pump adapter	1	
42	STD-213	SEAL, Oil, fuel pump drive adapter assembly	1	
43	68315	GASKET, Accessory drive adapter	1	

SECTION 10

PARTS SUPERSEDURES

SECTION 1

Part No.	Superseded by	Name	Remarks
Reference Page 1-1 - Crankcase			
72685	73953	Crankcase	Had crankshaft oil seal retaining plates.
73953	76596	Crankcase	Provision for adjustable oil pressure relief valve.
76596	78240	Crankcase	New crankshaft snap-in type oil seal.
78240	LW-11033	Crankcase	Straight rather than stepped main bearing dowel.
Models Affected: IO-540-A1A5, -B1C5, -C1B5, -C4B5, -C4C5, -D4A5			
72240	73959	Crankcase	Body fit thru bolts and crankshaft oil seal retaining plates.
73959	76598	Crankcase	Adjustable oil pressure relief valve.
76598	78242	Crankcase	New snap-in type crankshaft oil seal.
78242	LW-11035	Crankcase	Straight rather than stepped main bearing dowel.
Models Affected: IO-540-B1A5, -B1C5			
72240	73959	Crankcase	Body fit thru bolts and crankshaft oil seal retaining plates.
73959	74370	Crankcase	Piston cooling nozzles and stronger oil pressure relief valve spring.
74370	75487	Crankcase	Doweled to prevent case fretting.
75487	76612	Crankcase	Adjustable oil pressure relief valve.
76612	78243	Crankcase	New snap-in type crankshaft oil seal.
78243	LW-11036	Crankcase	Straight main bearing dowels.
Models Affected: IO-540-E1A5, -E1B5			
74758	75490	Crankcase	Doweled to prevent case fretting.
75490	76613	Crankcase	Adjustable oil pressure relief valve and crankshaft oil seal retaining plates.
76613	76244	Crankcase	Snap-in type crankshaft oil seal.
78244	LW-11037	Crankcase	Straight main bearing dowels.
Models Affected: IO-540-G1A5, -G1B5, -G1C5, -G1D5, -G1E5, -G1F5, -J4A5			

PARTS SUPERSEDURES

SECTION 1 (CONT.)

Part No.	Superseded by	Name	Remarks
75206	77263	Crankcase	Adjustable oil pressure relief valve and crankshaft oil seal retaining plates.
77263	LW-10141	Crankcase	Snap-in type crankshaft oil seal.
LW-10141	LW-11963	Crankcase	Straight main bearing dowels.
LW-11963	LW-12030	Crankcase	Studded for Freon compressor.
Models Affected: IO-540-M1A5			
75534	77624	Crankcase	Doweled to prevent case fretting, adjustable oil pressure relief valve, retaining plates for crankshaft oil seal.
77624	LW-10142	Crankcase	Snap-in type crankshaft oil seal.
LW-10142	LW-11964	Crankcase	Straight main bearing dowels.
Models Affected: IO-540-K Series, -N1A5, -R1A5			
79020	LW-11038	Crankcase	Straight main bearing dowels.
Models Affected: IO-540-E1B5			
LW-11039	LW-11221	Crankcase	Eliminates front baffle attaching holes.
Models Affected: IO-540-P1A5			
69796	LW-10647	Crankshaft Bearing Dowel	Straight main bearing dowel.
Models Affected: All			
Reference Page 1-2 - Crankcase			
76173	77808	Oil Pressure Relief Valve	Adjustable oil pressure relief valve.
Models Affected: Standard on: IO-540-G1B5, -G1C5, -J4A5, -K1A5, -K1C5, -K1E5, -M1A5, -P1A5, -R1A5 - Optional on all others			
61143	71714	Oil Relief Valve Plug	Plug used prior to adjustable oil pressure relief valve.
71714	76529	Oil Relief Valve Plug	Plug used with adjustable oil pressure relief valve.
Models Affected: Same supersedures as used above.			
71879-S	76940	Crankshaft Oil Seal	Required retaining plates.
76940	77377	Crankshaft Oil Seal	Snap-in type seal. Fits groove machined in crankcase. Diameter 3.336 - 3.360 in.
Models Affected: IO-540-A, -B, -C, -D, -E, -G Series, -J4A5, -K1E5, -P1A5			

PARTS SUPERSEDURES

SECTION 1 (CONT.)

Part No.	Superseded by	Name	Remarks
74305	78443	Crankshaft Oil Seal	Snap-in seal. Fits groove machined in crankcase. Diameter 3.460 - 3.484 in.
Models Affected: IO-540-K1A5, -K1B5, -K1C5, -K1D5, -M1A5, -N1A5, -R1A5			
Reference Page 1-3 - Crankcase			
72051	75737	Oil Filler Extension	Reinforced nylon tube.
Models Affected: IO-540-A1A5, -C1B5, -C4B5, -C4C5, -D4A5, -G1A5, -G1B5, -G1E5			
72986	75761	Oil Filler Extension	Reinforced nylon tube.
Models Affected: IO-540-A, -B, -E, -G1A5, -G1B5, -G1C5, -K1A5			
73680	75675	Oil Filler Extension	Reinforced nylon tube.
Models Affected: IO-540-A1A5, -E1B5, -G1A5, -G1B5, -G1C5, -G1E5, -G1F5, -K1A5, -K1C5, -K1E5			
74313	75759	Oil Filler Extension	Reinforced nylon tube. Uses P/N 74068 "O"-Ring.
75759	77527	Oil Filler Extension	Reinforced nylon tube. Uses P/N 72312 "O"-Ring.
Models Affected: IO-540-C1B5, -C4B5, -D4A5, -G1B5, -G1D5, -J4A5, -K1A5, -K1B5, -K1C5, -K1D5, -M1A5, -N1A5, -P1A5, -R1A5			
Reference Page 1-4 - Crankcase			
74582	75073	Crankshaft	No lightening holes in flange.
Models Affected: IO-540-C1B5			
72728	74581	Crankshaft	No sludge tubes.
74581	75039	Crankshaft	No sludge tubes, no lightening holes in flange.
Models Affected: IO-540-C, -D and -J4A5			
73996	74575	Crankshaft	No sludge tubes.
74575	75078	Crankshaft	No sludge tubes, no lightening holes in flange.
Models Affected: IO-540-A, -B, -E, -G Series, -P1A5			
72725	74578	Crankshaft	No sludge tubes.
74578	75075	Crankshaft	No sludge tubes. No lightening holes in flange.
Models Affected: IO-540-G1C5			
77192	LW-10621	Crankshaft	Repositions propeller flange bushings.
Models Affected: IO-540-N1A5			

PARTS SUPERSEDURES

SECTION 1 (CONT.)

Part No.	Superseded by	Name	Remarks
70256	73810	Dynamic Counterweight Bushing	Required to include crankshafts without sludge tubes.
Models Affected: All			
75657	79024	Propeller Flange Index Bushing	To include 3-bladed propeller.
Models Affected: IO-540-N1A5			
73049	LW-10124	Crankshaft Bearing	Used with heavy wall, low crush bearings and stepped dowel.
LW-10124	LW-11021	Crankshaft Bearing	To include straight main bearing dowel.
Models Affected: IO-540-A, -B, -C, -D, -E, -G Series, -J4A5, -P1A5			
74303	LW-11575	Crankshaft Bearing	To include straight main bearing dowels.
Models Affected: IO-540-K Series, -M1A5, -N1A5, -R1A5			
71637	75210	Crankshaft Front Bearing	Reduces crankshaft seal leakage by reducing the bearing clearance.
75210	77044	Crankshaft Front Bearing	Has an additional oil hole for added oil drain.
Models Affected: IO-540-A, -B, -C, -D, -E, -G Series, -J4A5, -P1A5			
74304	78319	Crankshaft Front Bearing	Reduces propeller transfer bearing leakage.
Models Affected: IO-540-K Series, -M1A5, -N1A5, -R1A5			
73062	76290	Hydraulic Tappet Plunger Assembly	Limited travel, slow leak down plunger.
76290	78290	Hydraulic Tappet Plunger Assembly	Removed limited travel plunger to reduce breakage.
Models Affected: All			
Reference Page 1-5 - Crankcase			
There are no supersedures on page 1-5.			
Reference Page 1-6 - Crankcase			
71643	76155	Tachometer Shaft Assembly	To include integral gear camshaft.
Models Affected: All			
70390	73014	Crankshaft Idler Gear Shaft	Had longer shaft.
73014	LW-10575	Crankshaft Idler Gear Shaft	Used to reduce wear in accessory housing.
Models Affected: All			

PARTS SUPERSEDURES

SECTION 1 (CONT.)

Part No.	Superseded by	Name	Remarks
71328	72565	Starter Ring Gear Support Assembly	72565 is 12/14 pinion pitch.
Models Affected: IO-540-C1B5			
72287	75221	Starter Ring Gear Support Assembly	75221 is 12/14 pinion pitch.
Models Affected: IO-540-E1B5			
Reference Page 1-7 - Crankcase			
There are no supersedures on page 1-7.			

SECTION 2

Part No.	Superseded by	Name	Remarks
Reference Page 2-1 - Accessory Housing			
71648	75367	Accessory Housing	75367 has long idler gear shaft.
75367	76152	Accessory Housing	76152 use with integral gear camshaft.
Models Affected: IO-540-C1B5, -C4B5, -D4A5, -N1A5			
71662	73007	Accessory Housing	Provides outboard support for 1 each 70390 and 73010 idler gear shafts.
73007	73015	Accessory Housing	Provides outboard support for idler gear shaft.
73015	73747	Accessory Housing	P/N 73747 can be used on both IO-540-B and -C engines. P/N 73015 can only be used on IO-540-B.
73747	76153	Accessory Housing	Use with integral gear camshaft.
Models Affected: IO-540-A, -B, -E, -C4C5, -G1A5, -G1B5, -G1D5, -G1E5, -G1F5, -J4A5, -K1A5, -K1C5, -K1E5, -R1A5			
71650	76156	Oil Accessory Breather Shield	Use with integral gear camshaft.
Models Affected: All			
60981			
60984	76354	Oil Pump Body	P/N 76354 is one piece oil pump body.
76354	78528	Oil Pump Body	For use with Sintered impellers.
Models Affected: All except IO-540-P1A5			
67512	74641	Oil Pump Drive Shaft	Used to reduce stress concentration at bottom of driving slot.
74641	78619	Oil Pump Drive Shaft	Use with Sintered impellers.
Models Affected: All except IO-540-P1A5			

PARTS SUPERSEDURES

SECTION 2 (CONT.)

Part No.	Superseded by	Name	Remarks
Reference Page 2-2 - Accessory Housing			
61154	77309	Crankshaft Idler Gear Bushing	P/N 77309 is 1/16 in. shorter and is press fit equally spaced from each end.
Models Affected: All except IO-540-C1B5, -C4B5, -D4A5, -N1A5, -P1A5			
Reference Page 2-3 - Accessory Housing			
There are no supersedures on page 2-3.			
Reference Page 2-4 - Accessory Housing			
73870	74999	Fuel Pump	To help reduce oil leakage.
74999	75131	Fuel Pump	Improved high pressure pump.
75131	75247	Fuel Pump	To eliminate cracked bosses, "AND-10056-6" inlet and outlet ports installed.
Models Affected: IO-540-C1B5, -C4B5, -D4A5, -N1A5			
73160	LW-10799	Fuel Pump	Compatible to both Lear-Siegler and Titan fuel pumps.
Models Affected: IO-540-E1B5, -G1B5, -G1C5, -K1A5, -K1B5, -K1C5, -K1E5, -M1A5			
Reference Page 2-5 - Accessory Housing			
74904	76691	Oil Filter Adapter Gasket	To eliminate leakage.
Models Affected: IO-540-A1A5, -C4B5, -D4A5, -G Series, -J4A5, -K1A5, -K1B5, -K1C5, -K1E5, -M1A5, -N1A5, -P1A5, -R1A5			
69451	75944	Oil Cooler Bypass Temp. Control Valve	Stronger valve with stainless steel shaft.
Models Affected: Same supersedure as above.			

SECTION 3

Part No.	Superseded by	Name	Remarks
Reference Page 2 - Cylinder			
71897	74522	Connecting Rod	Used crimp bolt nut.
74502	LW-10722	Connecting Rod	Tongue and groove rod.
LW-10722	LW-11457	Connecting Rod	Required longer bolt, has lengthened grip. Tongue and groove.
LW-11457	LW-11750	Connecting Rod	Same rod as LW-11457 except is not tongue and groove.
Models Affected: All models except -K Series and -M1A5			

PARTS SUPERSEDURES

SECTION 3 (CONT.)

Part No.	Superseded by	Name	Remarks
75059	LW-10646	Connecting Rod	Not phosphated but is tongue and groove.
Models Affected: IO-540-K Series and -M1A5			
71087	74644	Connecting Rod Bolt	Crimp lock nut feature.
74644	75061	Connecting Rod Bolt	Longer bolt for lengthened grip.
Models Affected: All models except -K Series and -M1A5			
71950	74646	Connecting Rod Bolt Nut	74646 is crimp nut.
74646	LW-12186	Connecting Rod Bolt Nut	LW-12186 is not crimp nut.
Models Affected: All			
75509	74309	Connecting Rod Bearing	75509 chrome backed, 74309 plain back for tongue and groove rods.
Models Affected: IO-540-K Series and -M1A5			
71594	72967	Piston	Uses half-wedge piston rings.
72967	74530	Piston	4-ring piston, not cold forged, comp. ratio 8.5:1.
74530	75089	Piston	3-ring piston, not cold forged, uses a narrow oil regulating ring.
Models Affected: IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
72954	73023	Piston	4-ring piston.
73023	73624	Piston	Standardize and cost reduction.
73624	75617	Piston	3-ring piston.
75617	78203	Piston	Larger OD at top ring land to reduce noise.
78203	LW-10207	Piston	Cold forged, 8.7:1 comp. ratio, 3-ring, half-wedge rings.
Models Affected: All models except IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
72446	74241	Compression Ring	Half-wedge ring.
Models Affected: All models except IO-540-E1B5			
71939	74673	Compression Ring	Made of material more compatible to chrome.
Models Affected: IO-540-A1A5, -B1B5, -C1C5, -C4B5, -E1A5, -E1B5, -G1B5			
72524	73998	Oil Regulating Ring	98 is 5/32 in. wide oil ring.
Models Affected: Same supersedure as above.			

PARTS SUPERSEDURES

SECTION 3 (CONT.)

Part No.	Superseded by	Name	Remarks
Reference Page 3-2 - Cylinder			
75394	74925	Cylinder	Short reach spark plug, parallel valves.
Models Affected: IO-540-C1B5, -C4C5			
72633	73951	Cylinder	73951 has 1/2 in. stem dia. exhaust valve, chrome cylinder, angle valves, short reach spark plugs.
73951	76189	Cylinder	Angle valves, up exhaust, shell molded heads, chrome cylinder.
Models Affected: IO-540-B1A5, -E1A5			
73236	73949	Cylinder	Nitrided cylinder, angle valves, 1/2 in. stem dia. exhaust valve, short reach spark plugs.
73949	76190	Cylinder	Nitrided cylinder, up exhaust, angle valves, shell molded heads.
Models Affected: IO-540-B1A5, -B1C5, -E1A5, -E1B5			
73707	73948	Cylinder	Nitrided cylinder, 1/2 in. stem dia. exhaust valve, angle valves, shell molded heads and short reach spark plugs.
Models Affected: IO-540-A1A5, -G1A5, -G1B5, -G1C5, -G1D5, -G1E5, -K Series			
69533	74230	Exhaust Valve Guide	Ni-resist guide for 1/2 in. stem diameter chrome plated exhaust valve.
Models Affected: IO-540-C Series and -D4A5			
73979	75838	Exhaust Valve Guide	Ni-resist guide for improved wear.
Models Affected: IO-540-G1F5, -K1E5, -M1A5, -P1A5			
Reference Page 3-3 - Cylinder			
72625	73938	Intake Valve	XBE material used to reduce leakage.
Models Affected: IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
71953	73117	Intake Valve	Solid stem valve, XBE material.
Models Affected: All models except IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
71595	74541	Exhaust Valve	Chrome plated stem, chrome nickel stainless face.
Models Affected: IO-540-C Series			
74802	LW-11250	Exhaust	Chrome plated stem, used with ni-resist guide.
Models Affected: IO-540-M1A5			

PARTS SUPERSEDURES

SECTION 3 (CONT.)

Part No.	Superseded by	Name	Remarks
69334 71381	73111	Exhaust Valve	Increased stem diameter to 1/2 in.
Models Affected: IO-540-A, -B, -E, -G, -K1A5, -K1B5, -K1C5, -K1D5			
68327	LW-10077	Upper Intake Valve, Spring Seat	LW-10077 is new number assigned.
Models Affected: All			
73115	LW-10076	Upper Exhaust Valve, Spring Seat	LW-10076 is new number assigned.
Models Affected: All			
65427	76994	Outer Valve Spring	Improved valve action.
76994	LW-11800	Outer Valve Spring	Provides stronger spring.
Models Affected: IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
68326	LW-11796	Outer Valve Spring	Provides stronger spring.
Models Affected: All models except IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
65567	LW-11795	Auxiliary Valve Spring	Provides stronger spring.
Models Affected: IO-540-C Series, -D4A5, -N1A5			
68328	LW-11797	Auxiliary Valve Spring	Provides stronger spring.
Models Affected: IO-540-C Series, -D4A5, -N1A5			
72050	MS-13997-3	Exhaust Valve Key	For 1/2 in. stem diameter exhaust valve.
Models Affected: All			
62388	MS-13998-3	Exhaust Valve Cap	For 1/2 in. stem diameter exhaust valve.
Models Affected: All			
Reference Page 3-4 - Cylinder			
71083	75774	Shroud Tube	Glass reinforced tube.
75774	LW-11485	Shroud Tube	Aluminum shroud tube.
Models Affected: IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
75773	72255	Intake Shroud Tube Assembly	Aluminum shroud tube.
Models Affected: IO-540-B, -E and -M1A5, Six tubes - IO-540-A, -G, -K and -P1A5, Two tubes			
75776	72257	Exhaust Shroud Tube Assembly	Aluminum tube
Models Affected: IO-540-B, -E and -M1A5			

PARTS SUPERSEDURES

SECTION 3 (CONT.)

Part No.	Superseded by	Name	Remarks
71449 66717	79051	Shroud Tube Springs	Provides improved sealing.
Models Affected: All models except, IO-540-C, -D4A5, -J4A5, -N1A5, -R1A5			
Reference Page 3-5 - Cylinder			
61246-S	75906	Rocker Box Cover Gasket	Parts standardization.
Models Affected: IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
72758	72242	Rocker Box Cover	Uses P/N 71450 gasket and STD-1826 screws.
Models Affected: IO-540-B, -E and -M1A5			
66731	72710	Valve Rocker Shaft Cover	P/N 72710 used on up-exhaust cylinders only. P/N 66731 has been reinstated on down-exhaust cylinders.
Models Affected: All except IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
73720	75118	Exhaust Flange Gasket	Standardized part numbers.
Models Affected: IO-540-C Series, -D4A5, -J4A5, -N1A5, -R1A5			
Reference Page 3-6 - Cylinder			
73708	74718	Baffle	Rework possible from P/N 73708 to P/N 74718.
Models Affected: IO-540-A, -G, -K Series			

SECTION 4

Part No.	Superseded by	Name	Remarks
Reference Page 4-1 - Ignition			
68875 70391	73009	Magneto Drive Gear Retainer	Reduced retainer failure.
73009	74830	Magneto Drive Gear Retainer	Provides for one piece magneto gear.
Models Affected: All			
68874	LW-12136	Magneto Drive Cushion	Improves starting with impulse coupling magnetos.
Models Affected: All			
71656	73627	Magneto Adapter	Provides for new casting.
Models Affected: All			

PARTS SUPERSEDURES

SECTION 4 (CONT.)

Part No.	Superseded by	Name	Remarks
73820	78292	Gasket, Magneto	Changes thickness.
Models Affected: IO-540-E1B5, -G1B5, -G1E5, -J4A5, -K1B5, -K1C5, -K1E5, -M1A5, -P1A5, -R1A5			
72522	73038	Magneto	Improved breaker life.
Models Affected: IO-540-A, -B, -C, -D4A5, -E1A5, -G1A5, -K1C5, -K1D5, -N1A5, -R1A5			
72523	73039	Magneto	Replaced P/N 72523 in system.
73039	73669	Magneto	Changed retard spark from 30° to 37-1/2°
Models Affected: IO-540-A, -B, -C, -D4A5, -E1A5, -G1A5, -K1C5, -K1D5, -N1A5, -R1A5			
Reference Page 4-2 - Ignition			
71888	75855	Harness Assembly	Blown-on sleeving, 5/8-24 spark plug elbow.
75855	77029	Harness Assembly	Hypalon wire, 5/8-24 spark plug elbow.
77029	78535	Harness Assembly	Silicone wire, 5/8-24 spark plug elbow.
Models Affected: IO-540-C, -D			
72375	75858	Harness Assembly	Blown-on sleeving, 5/8-24 spark plug elbow.
75858	77035	Harness Assembly	Hypalon wire, 5/8-24 spark plug elbow.
77035	78543	Harness Assembly	Silicone wire, 5/8-24 spark plug elbow.
Models Affected: IO-540-C1B5, -C4B5, -N1A5, -R1A5			
72259	77031	Harness Assembly	Blown-on sleeving, 5/8-24 spark plug elbow.
	75859	Harness Assembly	Blown-on sleeving, 5/8-24 spark plug elbow.
77031	77030	Harness Assembly	Hypalon wire, 5/8-24 spark plug elbow.
75859			
77030	78537	Harness Assembly	Silicone wire, 5/8-24 spark plug elbow.
Models Affected: IO-540-A1A5, -B1A5, -B1C5, -E1A5, -G1A5, -K1A5, -K1D5			
75967	LW-620470-2	Harness Assembly	Scintilla "Blue", 5MM harness, 5/8-24 spark plug elbow.
Models Affected: IO-540-J4A5			
75835	LW-620465-1	Harness Assembly	Scintilla "Blue", 5MM harness, 3/4-20 spark plug fittings, straight fittings.
LW-620465-1	LW-620465-2	Harness Assembly	Scintilla "Blue", 5MM harness with spark plug elbows, 3/4-20 spark plug elbow thread.
Models Affected: IO-540-M1A5			

PARTS SUPERSEDURES

SECTION 4 (CONT.)

Part No.	Superseded by	Name	Remarks
76960	LW-620515-1	Harness Assembly	5MM "Blue" Scintilla harness 5/8-24 spark plug elbow.
Models Affected: IO-540-E1B5			
77274	76885	Harness Assembly	Reduction of production costs. 5/8-24 spark plug elbow.
Models Affected: IO-540-G1B5, -G1C5, -G1D5, -G1E5, -K1A5, -K1B5			
78026	LW-11194	Harness Assembly	Compression type fittings for spark plugs and magnetos. 3/4-20 spark plug elbow. Leads, P/N 11959-48S and -72S without elbows are available.

Models Affected: IO-540-G1C5, -G1D5, -G1E5, -G1F5, -K1E5

Reference Page 4-3 - Ignition

There are no supersedures on page 4-3.

Reference Page 4-4 - Ignition

There are no supersedures on page 4-4.

Reference Page 4-5 - Ignition

There are no supersedures on page 4-5.

SECTION 5

Part No.	Superseded by	Name	Remarks
Reference Page 5-1 - Electrical			
There are no supersedures on page 5-1.			
Reference Page 5-2 - Electrical			
60861	76028	Generator Adjusting Link	Provides proper belt tension.
Models Affected: IO-540-A, -B, -C1B5, -D4A5, -E1A5, -E1B5, -K1B5			
Reference Page 5-3 - Electrical			
73276	75380	Link	Provides for parts standardization.
Models Affected: IO-540-A1A5, -C4B5, -D4A5, -E1A5, -G1B5, -G1C5, -G1D5, -G1E5, -G1F5, -J4A5, -K Series			
75574	78639	Pulley and Shaft Assembly	Provides improved bearing.
Models Affected: IO-540-G1B5, -K1A5, -K1C5, -M1A5, -P1A5			

PARTS SUPERSEDURES

SECTION 5 (CONT.)

Part No.	Superseded by	Name	Remarks
Reference Page 5-4 - Electrical			
72567	73269	Starter	Needle bearing construction.
73269	74092	Starter	Provided protection from failure thru kick-back.
74092	76211	Starter	Provides for cost reduction.
Models Affected: IO-540-A, -C, -D, -G1A5, -G1B5, -G1E5, -G1F5, -J4A5, -K1A5, -K1B5, -N1A5, -R1A5			
71975	72339	Starter	Provides belt clearance when using high speed generator.
72339	73272	Starter	Needle bearing construction.
73272	72462	Starter	Provides rubber cushioned drive.
72462	76212	Starter	Provides for cost reduction.
Models Affected: IO-540-A, -B, -C4B5, -E, -G1A5, -G1B5, -G1C5, -G1D5, -J4A5, -K1B5, -K1C5, -K1D5, -M1A5, -P1A5			
61427	76773	Magnetic Switch	Provides cost reduction (12 volt).
76773	LW-12083	Magnetic Switch	New, improved solenoid switch (12 volt).
Models Affected: IO-540-C4B5, -C4C5, -G1E5, -K1A5, -K1B5			
61941	76268	Magnetic Switch	For 24 volt systems only.
76268	76775	Magnetic Switch	Provides for cost reduction.
Models Affected: IO-540-A1A5, -E1B5, -G1A5, -G1B5, -G1C5, -G1D5, -K1A5, -K1B5, -K1D5			
76776	LW-12086	Magnetic Switch	New improved solenoid switch, externally grounded (24 volt).
Models Affected: IO-540-G1B5, -P1A5			
Reference Page 5-5 - Electrical			
77345	LW-10185	Voltage Regulator	Provides 12 volt transistor regulator with a switching rate that does not bias the remaining aircraft equipment.
Models Affected: IO-540-C, -D, -G1E5, -G1F5, -J4A5, -K1A5, -K1B5, -K1E5			
77347	LW-10179	Voltage Regulator	Provides for 24 volt transistor regulator with a switching rate that will not bias the remaining aircraft equipment.
Models Affected: IO-540-A1A5, -E1B5, -G1A5, -G1B5, -G1C5, -G1D5, -K1B5, -K1C5, -K1D5, -P1A5			
Reference Page 5-6 - Electrical			
74322	76026	Drive Belt	Provides Dacron material to reduce stretch.
Models Affected: All models except IO-540-B, -C1B5, -E1A5, -M1A5, -N1A5, -P1A5, -R1A5			

PARTS SUPERSEDURES
SECTION 6

Part No.	Superseded by	Name	Remarks
Reference Page 6-1 - Oil Sump			
67525	72812	Oil Sump Gasket	Provides improved material.
Models Affected: IO-540-C, -D, -J4A5, -N1A5, -R1A5			
71697	72056	Oil Sump	Relocation of nameplate from crankcase to sump.
Models Affected: IO-540-C, -D, -J4A5, -N1A5			
72345	74833	Oil Sump and Induction Housing	P/N 74833 is tuned sump providing for co-op ignition harness.
Models Affected: All models except IO-540-C, -D, -J4A5, -N1A5, -P1A5, -R1A5			
72810	LW-11273	Intake Pipe Extension Clamp	Provides wider clamping surface.
Models Affected: All models except IO-540-C, -D, -J4A5, -N1A5, -P1A5, -R1A5			
Reference Page 6-2 - Oil Sump			
73921 72753	LW-12191	Intake Pipe	Provides pipe with welded two piece flange.
72754	LW-12192	Intake Pipe	Same as above.
73922 72755	LW-12193	Intake Pipe	Same as above.
73923 72756	LW-12194	Intake Pipe	Same as above.
75223	LW-12195	Intake Pipe	Same as above.
Models Affected: All models except IO-540-C, -D, -J4A5, -N1A5, -R1A5			
60069	73346	Upper Intake Pipe Flange	Stronger flange to prevent warping.
Models Affected: IO-540-C, -D, -J4A5, -N1A5, -R1A5			
73346	74360	Upper Intake Pipe Flange	Stronger flange to prevent warping.
Models Affected: All models except IO-540-C, -D, -J4A5, -N1A5, -R1A5			
Reference Page 6-3 - Oil Sump			
76972	78103	Air Inlet Housing Assembly	Provides a fuel drain in air inlet housing.
Models Affected: IO-540-G1C5, -K1A5			
Reference Page 6-4 - Oil Sump			
73355	73967	Injector	Control stop material provides for increased wear.
Models Affected: IO-540-A1A5, -G1A5, -G1E5, -K1C5			

PARTS SUPERSEDURES

SECTION 6 (CONT.)

Part No.	Superseded by	Name	Remarks
73937	75176	Injector	Provides for straight mixture control lever.
Models Affected: IO-540-C4B5, -C4C5			
76083	75176	Injector	Service 76083 with 75176 on IO-540-J4A5 only.
Models Affected: IO-540-J4A5			
75567	LW-11746	Injector	Provides for shortened throttle lever arm (Aero Commander installations).
Models Affected: IO-540-G1C5			
77003	LW-11924	Injector	Customer request for (4) changes. 1. Change fuel pump to injector fuel line to opposite side of engine. 2. Use fuel line from injector to fuel manifold with fire sleeve. 3. Change nozzle pressure gage fitting in fuel manifold from -2 to -3. 4. Change fuel inlet pressure connection in injector from straight fitting to 45°.
Models Affected: IO-540-K1B5 (Britten-Norman installations)			
79008	LW-11007	Injector	Provides richer setting.
Models Affected: IO-540-P1A5			
76083	LW-10622	Injector	To provide same injector for -N1A5, -R1A5.
Models Affected: IO-540-N1A5, -R1A5			
AN914-1	LW-11867	Elbow	Provides steel elbow for strength.
Models Affected: IO-540-M1A5			
73969	75283	Manifold	Provides better fuel distribution.
Models Affected: IO-540-B, -E, -G1C5, -K1D5, -M1A5, -N1A5, -P1A5			
73969	75283	Manifold	Provides better fuel distribution.
75283	79007	Manifold	Provides non-aging control diaphragm.
Models Affected: IO-540-G1B5, -K1B5, -K1C5, -K1D5, -N1A5, -P1A5			
74591	LW-10475	Nozzle	P/N 74591 obsolete.
Models Affected: IO-540-G1B5, -J4A5, -K1B5, -P1A5, -R1A5			
72814	73021	Bracket	Part number change only.
Models Affected: IO-540-B, -E			

PARTS SUPERSEDURES

SECTION 6 (CONT.)

Part No.	Superseded by	Name	Remarks
Reference Page 6-5 - Oil Sump			
73963	LW-12098-1-200	Fuel Manifold to Nozzle Tube	New stock number to replace P/N 73963.
Models Affected: IO-540-A1A5, -C, -D, -G, -J4A5, -K, -N1A5, -P1A5, -R1A5			
73964	LW-12098-1-170	Fuel Manifold to Nozzle Tube	New stock number to replace P/N 73964.
Models Affected: IO-540-A1A5, -C, -D, -G, -J4A5, -K, -M1A5, -N1A5, -P1A5, -R1A5			
74649	LW-12098-2-276	Fuel Manifold to Nozzle Tube	New stock number to replace P/N 74649.
Models Affected: IO-540-G1C5, -K1A5, -K1B5			
73796	LW-12098-1-134	Fuel Manifold to Nozzle Tube	New stock number to replace P/N 73796.
Models Affected: IO-540-G1C5, -K1A5, -K1B5			
75469	LW-12098-0-100	Fuel Manifold to Nozzle Tube	New stock number to replace P/N 75469.
Models Affected: IO-540-M1A5			
LW-12098-1-200	LW-12098-0-200	Fuel Manifold to Nozzle Tube	Made by removing sleeving from LW-12098-1-200.
Models Affected: All models except IO-540-B, -D, -G1C5, -G1E5, -M1A5			
LW-12098-1-210	LW-12098-0-210	Fuel Manifold to Nozzle Tube	Made by removing sleeving from LW-12098-1-210.
Models Affected: IO-540-K1A5, -K1B5			
77369	LW-10049	Fuel Pump to Injector Tube	Customer request.
LW-10049	LW-10445	Fuel Pump to Injector Tube	P/N LW-10445 is longer hose.
Models Affected: IO-540-G1B5, -K1C5, -P1A5			
77369	LW-11925	Fuel Pump to Injector Tube	Customer request (Britten-Norman).
Models Affected: IO-540-K1B5			
72860	73320	Metering Valve to Fuel Manifold Hose	Provides longer hose for oil cooler clearance and requires cure date.
Models Affected: IO-540-G1C5, -K1A5, -K1B5			
73974	74630	Fuel Manifold to Fuel Manifold Hose	Provides for cure date.
Models Affected: IO-540-G1C5, -K1A5, -K1B5			
76926	73320	Fuel Injector to Fuel Pump Hose	P/N 73320 does not require cure date.
Models Affected: IO-540-G1C5, -K1A5, -K1B5			

PARTS SUPERSEDURES

SECTION 6 (CONT.)

Part No.	Superseded by	Name	Remarks
72863	75203	Fuel Injector to Fuel Manifold Hose	P/N 75203 requires cure date.
75203	79018	Fuel Injector to Fuel Manifold Hose	P/N 79018 does not require cure date.
Models Affected: IO-540-G1B5, -K1B5, -P1A5			
73974	LW-10642	Fuel Injector to Fuel Manifold Hose	IO-540-R1A5 only.
Models Affected: IO-540-R1A5			
Reference Page 6-6 - Oil Sump			
73650	LW-12145	Clip	LW-12145 alternate to MS21919-F12.
LW-12145	LW-12202	Clip	Service with MS21919-DF4.
Models Affected: IO-540-A1A5, -C, -D, -G, -J4A5, -K, -N1A5, -P1A5, -R1A5			