O-235-L2A, -L2C Series Illustrated Parts Catalog

December 2012

PC-302-L2A, -L2C

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652 Oliver Street Williamsport, PA 17701

O-235-L2A, -L2C Illustrated Parts Catalog

Lycoming Part Number: PC-302-L2A, -L2C

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*********NOTICE*********

This parts catalog PC-302-L2A, -L2C supersedes and replaces the O-235-L2A and O-235-L2C model engines that are covered in PC-302-1.

NOTE: Service documents override parts information in this document.

RECORD OF REVISIONS

Rev No.	Issue Date	Initials	Insertion Date

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LIST OF EFFECTIVE PAGES

Ch-Se-Su	Pages	Date
24-20	0-5	12/12
72-20	6-15	12/12
72-30	16-27	12/12
72-50	28-31	12/12
72-60	32-49	12/12

<u>Ch-Se-Su</u>	Pages	Date
	-	
73-10	.50-53	12/12
74-20	.54-59	12/12
80-10	.60-61	12/12
Service Kits	.62-63	12/12
Numerical Index	.64-67	12/12

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TABLE OF CONTENTS

Subject	<u>Ch-Se-Su</u>	Page	Date
Frontal			
Record of Revisions		iii	12/12
List of Effective Pages			
Table of Contents			
Introduction		ix	12/12
Abbreviations and Acronyms		xiii	12/12
Oversize and Undersize Part Listing		XV	12/12
Electrical Power	24-00		
AC Generation			
1. Alternator-Mounting-and-Attaching-Parts		0-1	12/12
2. Alternator-Attaching-Parts-(Piper)		2-3	12/12
3. Alternator-Attaching-Parts-(Ford)		4-5	12/12
Reciprocating Engine	72-00		
Power Section	72-20		
1. Crankcase-Assembly		6-7	12/12
2. Crankcase-Related-Parts		8-9	12/12
3. Crankshaft-Assembly-and-Related-Parts		10-11	12/12
4. Crankshaft-Idler-Gears,-Tachometer-Drive-and-Cam	shaft	12-13	12/12
5. Crankcase-Attaching-Parts		14-15	12/12
Cylinder Section	72-30		
1. Connecting-Rods,-Pistons-and-Ring-Assemblies		16-17	12/12
2. Cylinder-Assembly			12/12
3. Valve-Assembly-and-Related-Parts		20-21	12/12
4. Cylinder-Related-Parts		22-23	12/12
5. Cylinder-Head-Drain-Tubes and -Intercylinder-Coolir	ng-Baffles	24-2521	12/12
6. Intake-Pipes-and-Attaching-Parts		26-27	12/12
Lubrication System	72-50		
1. Oil-Level-Gage-Assemblies			12/12
2. Oil-Sump-Assembly-and-Oil-Suction-Screen			12/12
Accessory Drives	72-60		
1. Accessory-Housing-Assembly			12/12
2. Oil-Pump-Assembly-and-Accessory-Housing-Attachi	ing-Parts		12/12
3. Fuel-Pump-Assembly-and-Attaching-Parts			12/12
4. Vacuum-Pump-Drive-and-Cover			12/12
Effectivity: O-235-L2A, -L2C Engines		Table	of Contents

LYCOMING

<u>Subject</u>	<u>Ch-Se-Su</u>	<u>Page</u>	Date
Accessory Drives (Cont.)	72-60		
5. Oil-Cooler-Bypass-Valve-and-Remote-Oil-Filter		40-41	12/12
6. Oil-Filter-Assembly-and-Oil-Cooler-Bypass-Valve		42-43	12/12
7. Oil-Filter-Assembly-and-Oil-Cooler-Bypass-Fittings-	(No-Thermo-Val	ve)44-45	12/12
8 Oil-Suction-Screen-and-Oil-Cooler-Bypass-Valve		46-47	12/12
9. Oil-Suction-Screen-and-Oil-Cooler-Bypass-Fittings-	(No-Thermo-Valv	/e)48-49	12/12
Engine and Fuel Control	73-00		
Fuel Distribution	73-10		
1. Carburetor-Assembly		50-51	12/12
2. Priming-Lines			12/12
Ignition Distribution System	74-00		
Distribution	74-20		
1. Magnetos,-Magneto-Drives,-Harnesses-and-Spark-	Plugs		12/12
Starting	80-00		
Cranking	80-10		
1. Starter-Motor-and-Attaching-Parts		60-61	12/12
Back Section			
Service Kit Section		62-63	12/12
Numerical Index		64-67	12/12



INTRODUCTION

CAUTION: DO NOT USE THIS CATALOG AS AN ASSEMBLY OR INSTALLATION DOCUMENT. THIS CATALOG MUST ONLY BE USED TO IDENTIFY PARTS IN CONJUNCTION WITH THE APPLICABLE OVERHAUL MANUAL.

Purpose of this Catalog

This Illustrated Parts Catalog (IPC) contains a complete list of spare parts for the Lycoming O-235-L2A, -L2C wide cylinder flange model engines.

How to Use this Catalog

This catalog is based on the Air Transport Association (ATA) Spec100 format. In order to clarify illustrations, Lycoming has taken discretion to classify non-system related assemblies and components in the same chapters, because they are physically connected.

This catalog is frequently updated by Service Bulletins (SB) and Service Instructions (SI). The updated information will be incorporated into subsequent full revisions of this catalog.

The ATA two element numbering system provides consistency throughout various manuals. The bottom of each page (beyond the frontal section) contains a two element number (##-##). In the two element numbering, the first two digits represent a chapter, and the next two digits subdivide the material into a more specific section.

The ATA 100 format specifies the subject matter for each chapter-section. According to the ATA Standards, the following chapters apply to the O-235-L2A, -L2C Illustrated Parts Catalog.

72 (Reciprocating Engine), 73 (Engine and Fuel Control), 74 (Ignition), and 76 (Engine Controls).

EXAMPLE:	74	<u> </u>
	Chapter	Section
	Ignition	Distribution

NOTE: See the IPC Table of Contents for the sub-systems listed in each section.

Numerical Index

The Numerical Index is a single list of part numbers, names and their locations within the IPC. It is useful for locating parts when you only know the number or name of the part.

Description column

Indentation of a part name represents a lower level of assembly. Attaching parts have the same indentation level and are listed below the parts grouping or assembly they attach to. This column is often referred to as the "Nomenclature" on other ATA Spec manuals.



Units per Assembly Column

Where more than one assembly exists, this column contains the quantity of a specific part required in the build sequence of only one next higher assembly. The letters "AR" represent "as required" for bulk items or non-illustrated select-from-range-parts. "RF" represents items listed for reference purposes only.

Cross Reference List of Manufacturer Parts to Standard Part Numbers

Vendor Accessories

Parts coverage of Vendor Accessories used on Lycoming engines may be found in the appropriate Vendor's Parts Catalog. A list of vendor's addresses appears in the latest revision of Lycoming Service Letter No. L114.

Any reference in this document to the suppliers/part manufacturer's product, by name, trademark, part number or other description is solely for the purpose of identification and does not indicate or infer that Lycoming accepts responsibility for quality control and/or airworthiness of parts, which do not pass through the Lycoming quality control system.

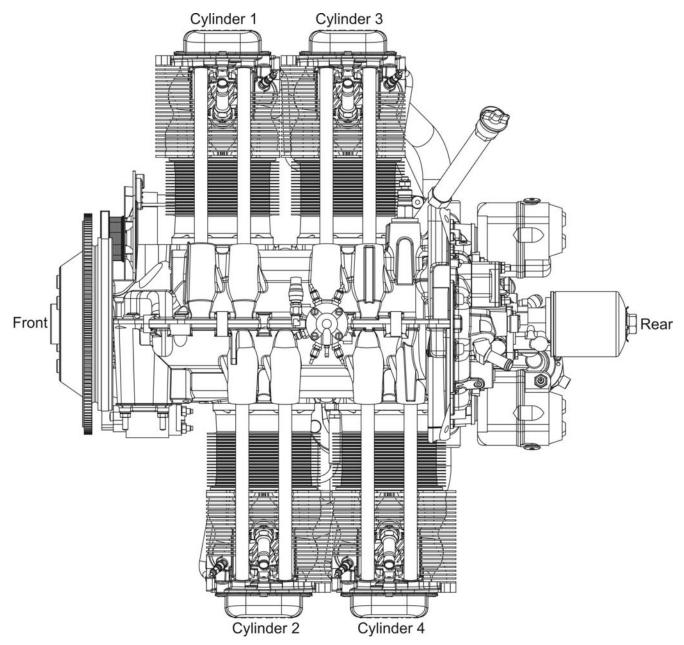
Environmental Compliance

Lycoming is concerned with preserving the environment. Lycoming strongly urges engine owners and repair/overhaul personnel to observe and comply with all federal, state, and local environmental regulations when solvents, paint, fuel, oil, chemicals, or other consumables are used in operating, maintaining, or overhauling an engine component. Please share our concern for, and commitment to a clean earth, clean water, and especially clean air for succeeding generations of flyers.



Perspective of References

In this manual, all references to locations of various components will be designated as if viewing the engine from the rear (or anti-propeller) end. The front of the engine is considered to be the propeller end and the oil sump is considered to be on the bottom of the engine. Cylinders are numbered from front to rear with the odd-numbered cylinders on the right-hand side. The firing order for this engine is 1-3-2-4



Top View of Engine

How to Order Parts and Publications

An Oversize and Undersize Parts List is included in the front section of this catalog, to aid in ordering parts as necessary during overhaul.

Although the information contained in this parts catalog is up-to-date at time of publication, users are advised to procure current information through all Lycoming distributors or from the factory by subscription. Refer to the latest revision of Service Letter No. L114 for subscription information.

- 1. In order to expedite correct part shipments without delay:
 - a. Always specify the model and serial number of your engine.
 - b. Always specify the part number, nomenclature, and quantity required.

The SB and SI documents are available from Lycoming distributors, or the factory, or by subscription.

Full Revisions of the Illustrated Parts Catalog are available from Lycoming distributors or the factory.

Every effort has been made in preparing this manual to ensure its accuracy. However, any comments, suggestions, or corrections to this manual are welcome and must be directed in writing to:

Technical Publications Coordinator Lycoming Engines 652 Oliver Street Williamsport, PA 17701

NOTE: The owner of the manual must give notification to the factory for a change of address.

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ABBREVIATIONS AND ACRONYMS

		Α
Adj.	Adjustable	
		C
Cyl.	Cylinder	
		D
Dia.	Diameter	
		F
Fill.	Fillister	
		н
Hex.	Hexagon	
		I
I.D.	Inside Diameter	
		Ν
No.	Number	
		0
O.D.	Outside Diameter	
		S
Scav.	Scavenge	
		т
Temp.	Temperature	
		V
Vac.	Vacuum	

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					Oversi	ze (in.)				Und	lersize	(in.)
Part No.	Description	P02 .002	P05 .005	P10 .010	P15 .015	P20 .020	P30 .030	P40 .040	P50 .050	M03 .003	M06 .006	M10 .010
18D26011	BEARING									х	Х	Х
18M26104	BEARING									Х	Х	Х
LW-13792	SEAL								Х			
73757-S	BUSHING		Х	Х	Х	Х						
60814-S	BUSHING		Х	Х	Х	Х						
STD-1065	DOWEL	X	Х	Х	Х							
78862	RING			Х								
78864	RING			Х		х						
LW-11900	SEAT		Х	Х		Х	Х					
LW-16699	SEAT		Х	Х		Х	Х					
61681*	GUIDE		Х	Х		Х	Х	Х				
LW-11626	GUIDE		Х	Х		Х	Х	Х				
66610	BUSHING		х	Х								

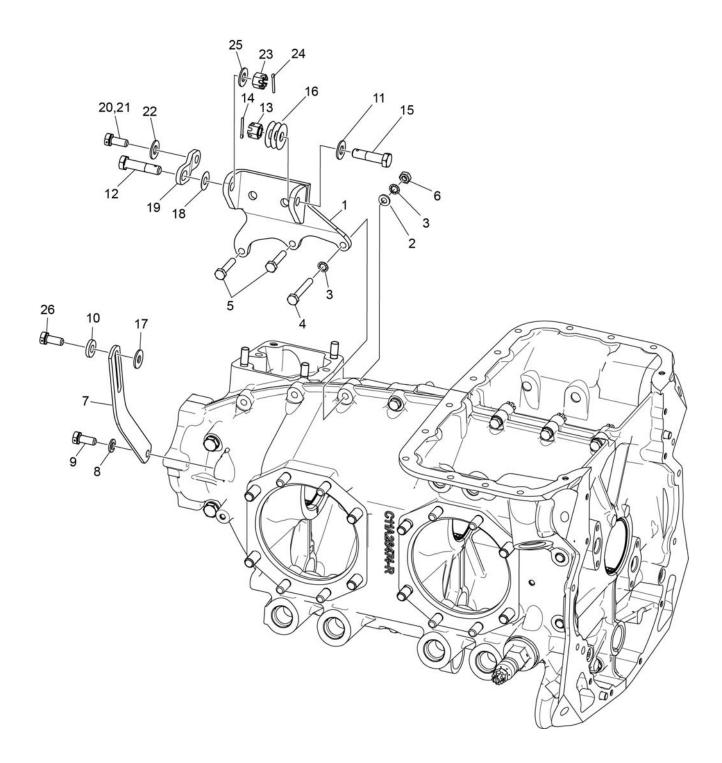
OVERSIZE AND UNDERSIZE PARTS LISTING

* Reference Figure 10 items no. 4 and 5 for valve guides

NOTE

When ordering oversize and undersize parts, be sure to specify the required oversize and undersize dimension along with the proper part number. For example, to order bearing P/N 18D26098 bearing in .003 in. undersize, order P/N 18D26098-M03. Undersize code letter is "M" while oversize code letter is "P". These letters are then followed by the number designating the size in thousandths of an inch.

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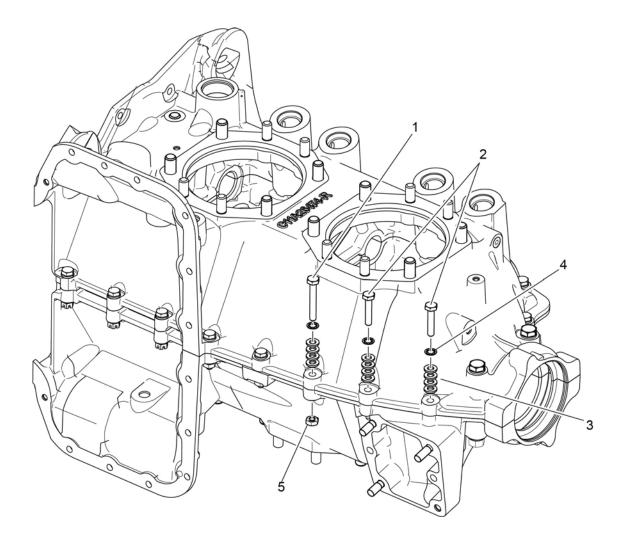
Alternator Mounting and Attaching Parts Figure 1



ELECTRICAL POWER

FIGURE 1 – ALTERNATOR MOUNTING AND ATTACHING PARTS

Figure	Code	Part Number	Description		s per mbly
ltem				L2A	L2C
1		78158	BRACKET, Alternator	1	1
2		STD-8	WASHER, 1/4 plain	1	1
3	AR	STD-160	WASHER, 1/4 lock, internal teeth	AR	AR
4		LW-25-1.75	BOLT, 1/4-20 x 1-3/4 long, hex. head	1	1
5		LW-25-1.25	BOLT, 1/4-20 x 1-1/4 long, hex. head	2	2
6		STD-1411	NUT, 1/4-20 plain	1	1
7		75380	LINK, Alternator adjusting	1	1
8		STD-35	WASHER, 5/16 plain	1	1
9		LW-31H0.75	BOLT, 5/16-18 x 3/4 long, hex. head, drilled	1	1
10		STD-1727	WASHER, Plain, 21/64 I.D. x 3/4 O.D.	1	1
11		STD-690	WASHER, 13/16 O.D. x 3/8 I.D. x 1/16 thick	1	1
12		AN6-14	BOLT, 3/8-24 x 1-37/64 long, drilled	1	1
13		STD-872	NUT, 3/8-24 slotted	1	1
14		STD-713	COTTER PIN, 3/32 diameter x 3/4 long	1	1
15		AN6-13	BOLT, 3/8-24 x 1-7/16 long, drilled	1	1
		AN6-16	BOLT, 3/8-24 x 1-53/64 long, hex. head		1
16		76534	SHIM, 1-1/8 O.D. x 13/32 I.D. x .005 thick	3	3
17		STD-2197	WASHER, 5/16 I.D. x 13/16 O.D. x 1/16		2
18		LW-14649	SHIM, 13/16 O.D. x 11/32 I.D. x .010 thick		2
19		07F23268	STRUT, Alternator support, 3/16 thick	1	1
20		LW-31H0.88	BOLT, 5/16-18 x 7/8 long, hex. head, drilled		1
21		LW-31H0.75	BOLT, 5/16-18 x 3/4 long, hex. head, drilled	1	1
22		STD-690	WASHER, 3/16 O.D. x 3/8 I.D. x 1/16 thick	1	1
		STD-690	WASHER, 3/16 O.D. x 3/8 I.D. x 1/16 thick	3	3
23		STD-872	NUT, 3/8-24 slotted	1	1
24		STD-713	COTTER PIN, 3/32 diameter x 3/4 long	1	1
25		STD-690	WASHER, 13/16 O.D. x 3/8 I.D. x 1/16 thick	3	3
26		LW-31H0.75	BOLT, 5/16-18 x 3/4 long, hex. head, drilled	1	1
AR As	s required			·	



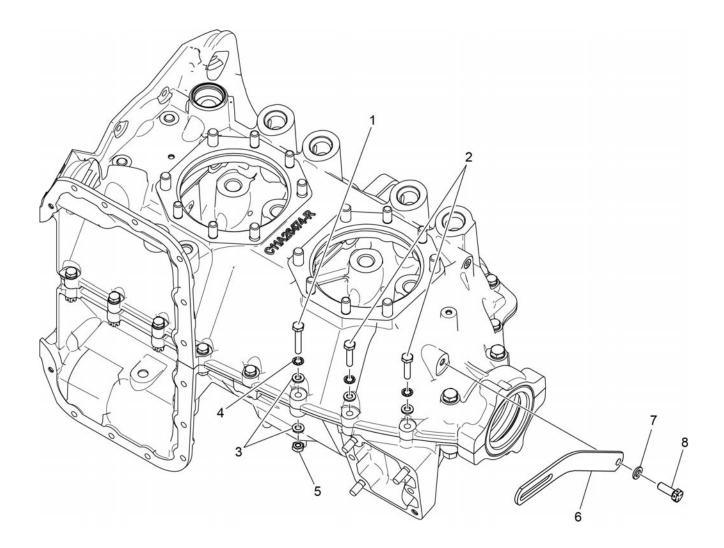
Alternator Attaching Parts (Piper) Figure 2

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	FIGURE 2 - ALTERNATOR ATTACHING PARTS (PIPER)						
Figure Item Code	Code Part Number	Part Number	Description	Units per Assembly			
item			L2A	L2C			
1		LW-25-1.75	BOLT, 1/4-20 x 1-3/4 long, hex. head		1		
2		LW-25-1.25	BOLT, 1/4-20 x 1-1/4 long, hex. head		2		
3		STD-8	WASHER, 1/4 plain		12		
4		STD-160	WASHER, 1/4 lock, internal teeth		3		
5		STD-1411	NUT, 1/4-20 plain		1		

ELECTRICAL POWER



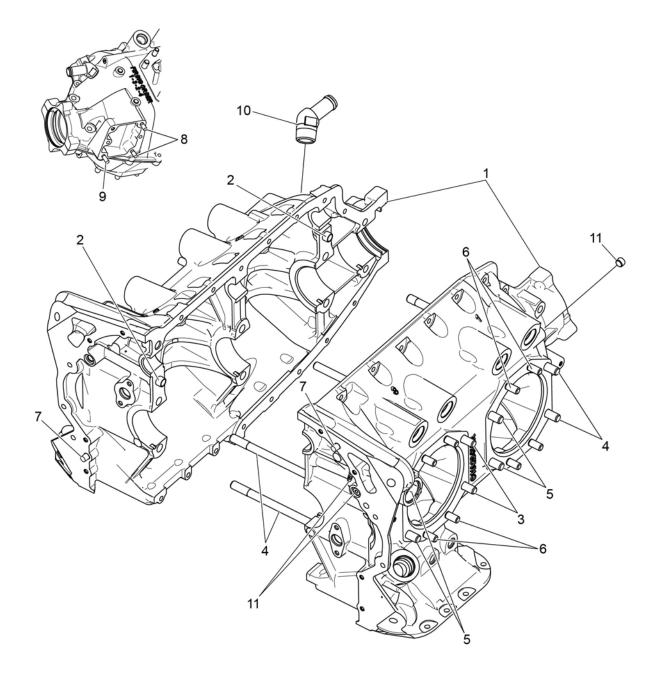
Alternator Attaching Parts (Ford) Figure 3



Figure Code	Part Number	Description	Units per Assembly		
ltem				L2A	L2C
1		LW-25-1.50	BOLT, 1/4-20 x 1-1/2 long, hex. head		1
2		LW-25-1.13	BOLT, 1/4-20 x 1-1/8 long, hex. head		2
3		STD-8	WASHER, 1/4 plain		4
4		STD-160	WASHER, 1/4 lock, internal teeth		3
5		STD-1411	NUT, 1/4-20 plain		1
6		LW-10729	LINK, Alternator adjusting		1
7		STD-35	WASHER, 5/16 plain		1
8		LW-31H0.88	BOLT, 5/16-18 x 7/8 long, hex. head, drilled		1

ELECTRICAL POWER

FIGURE 3 - ALTERNATOR ATTACHING PARTS (FORD)



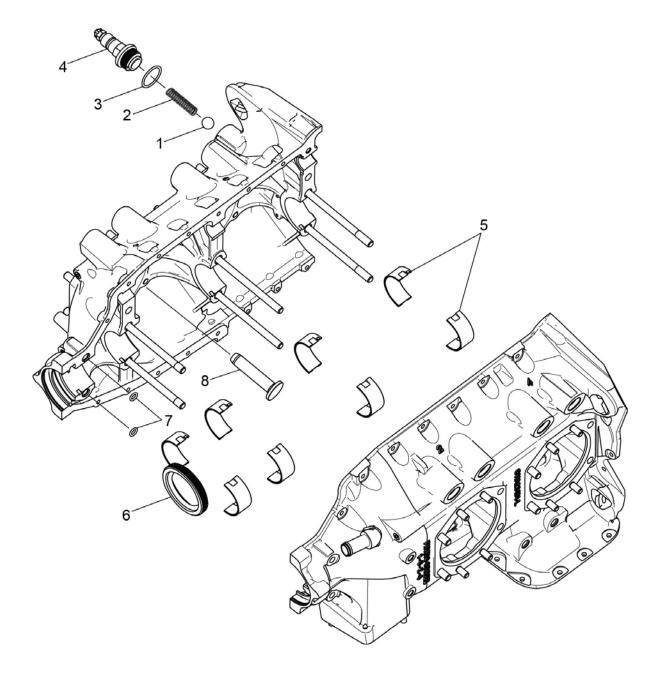
Crankcase Assembly Figure 4



Figure Co	Code	Part Number	Description		s per mbly
Item				L2A	L2C
1	*	11A26476-S	CRANKCASE ASSEMBLY KIT	1	1
	Р	11A26476	CRANKCASE ASSEMBLY	1	1
2		STD-557	DOWEL, 1/2 diameter x 11/16 long	2	2
3		LW-11623	STUD, 7/16-20 x 10-7/16 long	2	2
4		LW-11622	STUD, 7/16-14 x 9-49/64 long	4	4
5		44-13	STUD, 7/16-14 x 1-5/8 long	8	8
6		38-13	STUD, 3/8-16 x 1-5/8 long	16	16
7		STD-514	DOWEL, 5/16 diameter x 1/2 long	2	2
8		31C-12	STUD, 5/16-18 x 1-1/2 long	2	2
9		31C-13	STUD, 5/16-18 x 1-5/8 long	1	1
10		AN844-12D	ELBOW, 3/4 NPT to 3/4 I.D. hose	1	
		AN842-12D	ELBOW, 3/4 NPT to 90°	1	1
11		1102	PLUG, 1/8-27 NPT, allen head	3	3

POWER SECTION

FIGURE 4 - CRANKCASE ASSEMBLY



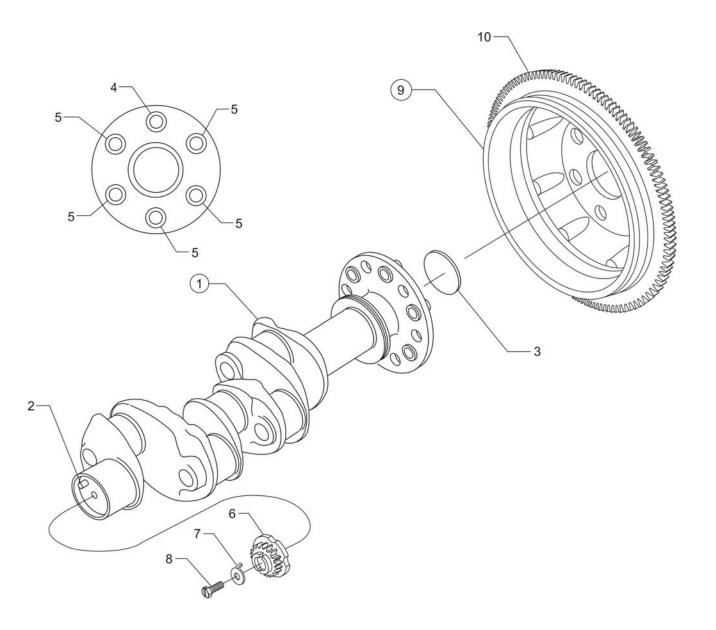
Crankcase Related Parts Figure 5



Figure Item	Code	Part Number	Description	Units per Assembly		
				L2A	L2C	
1		1028-B	BALL, 11/16 diameter	1	1	
2	*	61084	SPRING, Oil pressure relief valve	1	1	
	*	68668	SPRING, Oil pressure relief valve	1	1	
	*	77467	SPRING, Oil pressure relief valve	1	1	
	*	LW-11713	SPRING, Oil pressure relief valve	1	1	
	*	LW-18085	SPRING, Oil pressure relief valve	1	1	
3		06E19769-1.25	GASKET, Annular, 1-1/4 I.D	1	1	
4		77808	VALVE ASSEMBLY, Oil pressure relief	1	1	
5		18D26100	BEARING, Crankshaft	8	8	
6	**	LW-13792	SEAL, Crankshaft oil	1	1	
7		72091	RING, Oil seal, 3/8 I.D. x 31/32 diameter	8	8	
8		15B26091	TAPPET ASSEMBLY	8	8	
 * Select spring to give a minimum of three threads exposed on adjusting screw to allow field adjustment. Reference latest revision of SSP-1776, Part I for spring identification. ** Refer to the latest revision of Service Instruction No. 1324 for installation. 						

POWER SECTION

FIGURE 5 - CRANKCASE RELATED PARTS



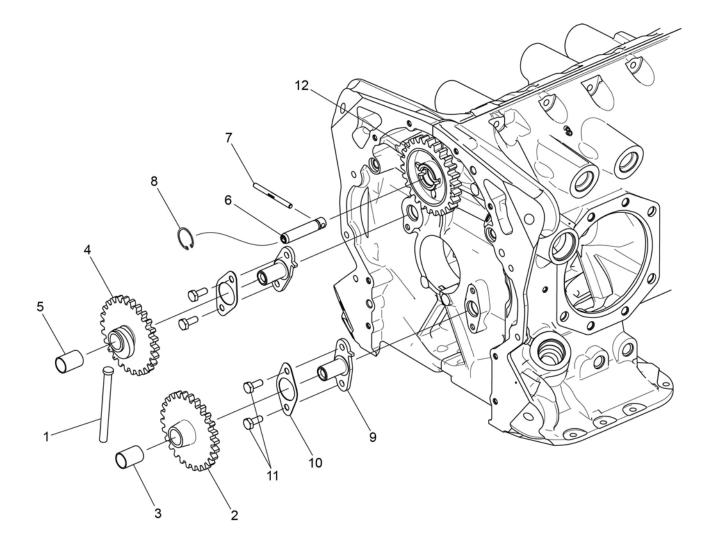
Crankshaft Assembly and Related Parts Figure 6



Figure	Code	Part Number	Description		Units per Assembly	
ltem				L2A	L2C	
1		13B47431	CRANKSHAFT ASSEMBLY	1	1	
2		STD-1065	DOWEL, Stepped, 5/16-1/4 diameter	1	1	
3		STD-1211	PLUG, 2.00 diameter expansion	1	1	
4		73757-S	BUSHING, Propeller flange, indexing	1	1	
5		60814-S	BUSHING, Propeller flange	5	5	
6	SB*	13S19646	GEAR, Crankshaft	1	1	
7		LW-18639	LOCKPLATE, Crankshaft gear	1	1	
8		STD-2246	BOLT, 5/16-18 x 1.00 long	1	1	
9		LW-13675	SUPPORT ASSEMBLY, Starter ring gear	1	1	
10		60882	GEAR, Starter ring, 10/12 pitch	1	1	
 SB Referencing Service Bulletin * Refer to the latest revision of Service Bulletin No. 475 for proper installation. 						

POWER SECTION

FIGURE 6 - CRANKSHAFT ASSEMBLY AND RELATED PARTS



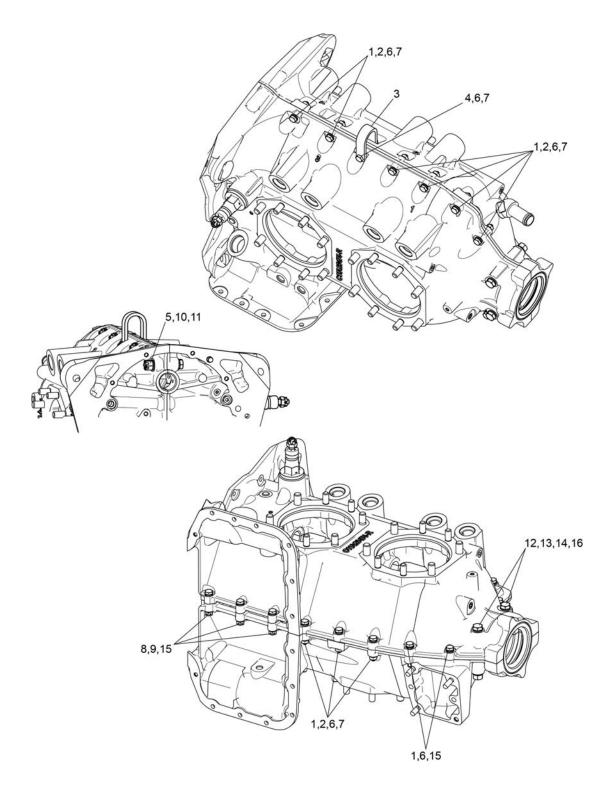
Crankshaft Idler Gears, Tachometer Drive and Camshaft Figure 7



POWER SECTION

FIGURE 7 - CRANKSHAFT IDLER GEARS, TACHOMETER DRIVE AND CAMSHAFT

Figure Item	Code	Part Number	Description	Units per Assembly		
item				L2A	L2C	
1		23D26777	PLUNGER, Fuel pump, long	1	1	
2		74996	GEAR ASSEMBLY, Crankshaft idler, plain	1	1	
	*	74996	GEAR ASSEMBLY, Crankshaft idler, plain		2	
3		77309	BUSHING, Crankshaft idler gears	1	1	
4		75072	GEAR ASSEMBLY, Crankshaft idler	1	1	
5		77309	BUSHING, Crankshaft idler gear	1	1	
6		75708	SHAFT ASSEMBLY, Tachometer	1	1	
7		LW-18667	PIN, 3/16 diameter x 2-11/32 long	1	1	
8		45530	RING, Retaining, 3/8 I.D. x 1/16 square	1	1	
9		61151	SHAFT, Crankshaft idler gear	2	2	
10		73817	LOCKPLATE, 1/4 bolt, 1-3/4 spacing	2	2	
11		LW-25-0.63	BOLT, 1/4-20 x 5/8 long, hex. head	4	4	
12		75706	CAMSHAFT ASSEMBLY	1	1	
* Used on engines without a fuel pump.						



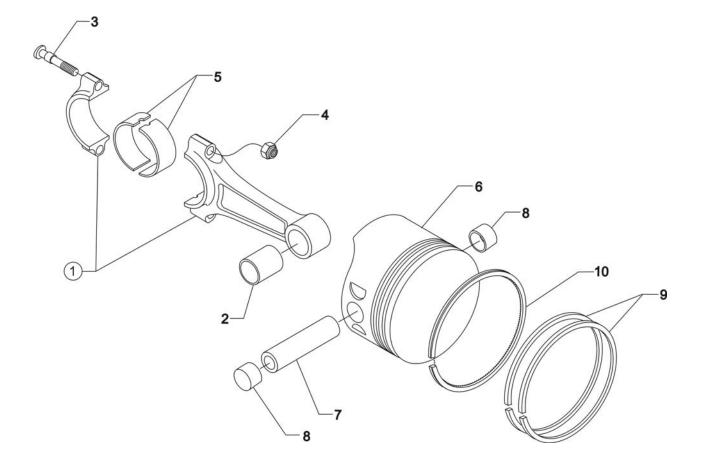
Crankcase Attaching Parts Figure 8



Figure	Code	Part Number	r Description	Units per Assembly	
ltem				L2A	L2C
1		LW-25-1.50	BOLT, 1/4-20 x 1-1/2 long, hex. head	8	8
2		STD-8	WASHER, 1/4 plain	16	16
3		60803	STRAP, Lifting	1	1
4		LW-25-1.75	BOLT, 1/4-20 x 1-3/4 long, hex. head	1	1
5		AN6-21	BOLT, 3/8-24 UNF x 2-3/16 long, drilled	1	1
6		STD-160	WASHER, 1/4 lock, internal teeth	9	9
7		STD-1411	NUT, 1/4-20 plain	9	9
8		LW-25S1.50	BOLT, 1/4-20 x 1-1/2 long, drilled end	3	3
9		STD-2249	NUT, 1/4-20 slotted	3	3
10		STD-33	WASHER, 3/8 plain	2	2
11		STD-872	NUT, 3/8-24 slotted	1	1
12		AN6-34A	BOLT, 3/8-24 x 3-37/64 long, hex. head	2	2
13		STD-678	WASHER, 3/8 lock, internal teeth	2	2
14		STD-596	NUT, 3/8-24 plain	2	2
15		STD-8	WASHER, 1/4 plain	9	9
16		STD-33	WASHER, 3/8 plain	4	4

POWER SECTION

FIGURE 8 - CRANKCASE ATTACHING PARTS



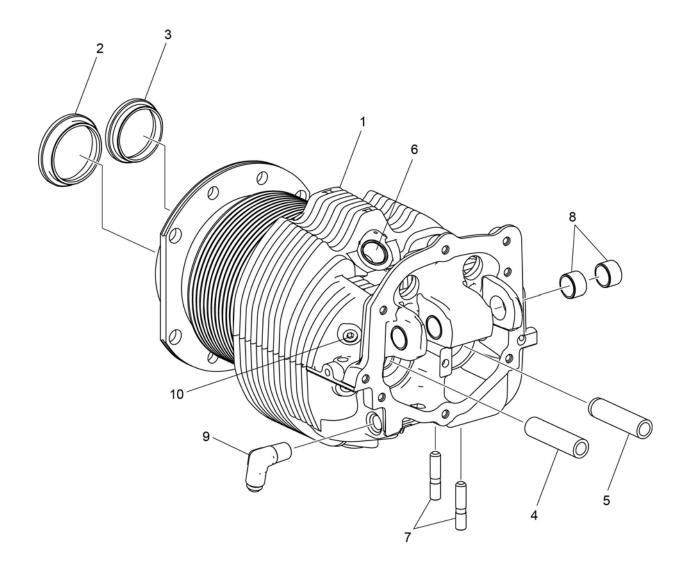
Connecting Rods, Pistons and Ring Assemblies Figure 9



FIGURE 9 - CONNECTING RODS, PISTONS AND RING ASSEMIDLIES						
Figure Item C	Code	ode Part Number	Description	Units per Assembly		
				L2A	L2C	
1		78030-S	CONNECTING ROD ASSEMBLY	4	4	
2		LW-13923	BUSHING, Connecting rod, upper	4	4	
3		78027	BOLT, Connecting rod	8	8	
4		LW-12186	NUT, Connecting rod bolt	8	8	
5		18M26104	BEARING, Connecting rod	8	8	
6		LW-18729	PISTON, 8.50:1 compression ratio	4	4	
7		LW-13445	PIN, Piston	4	4	
8		LW-11625	PLUG, Piston pin	8	8	
9		78862	RING, Piston compression	8	8	
10		78864	RING, Piston, oil	4	4	

CYLINDER SECTION

FIGURE 9 - CONNECTING RODS, PISTONS AND RING ASSEMBLIES



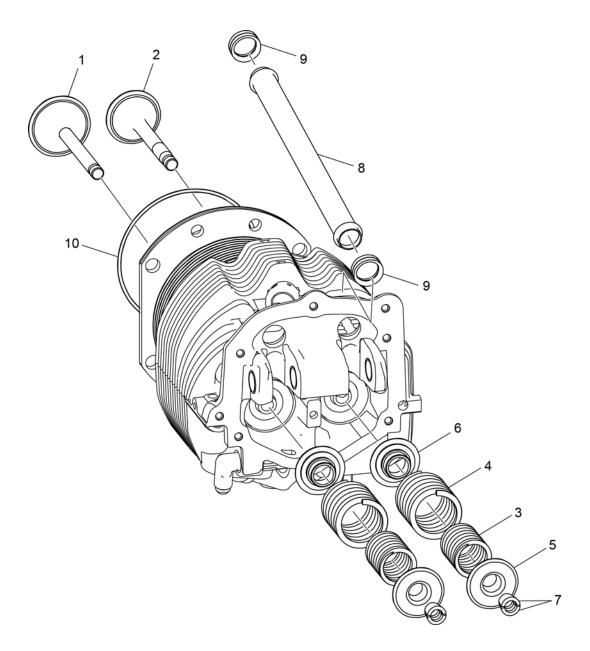
Cylinder Assembly Figure 10



Figure Item	Code	Part Number	Description	Units per Assembly			
				L2A	L2C		
1		16A26616	CYLINDER ASSEMBLY, Nitrided	4	4		
2		LW-11900	SEAT, Intake valve	4	4		
3		LW-16699	SEAT, Exhaust valve	4	4		
4	P*	76943	GUIDE, Valve, intake	4	4		
5	P *	LW-12137	GUIDE, Valve, exhaust	4	4		
6	P♦	66796	INSERT, Spark plug, 18-1.5 mm	8	8		
7		31C-12	STUD, 5/16-18 x 1-1/2 long	8	8		
8		66610	BUSHING, Rocker shaft	16	16		
9		STD-700	ELBOW, 90°, 3/8 flared tube	4	4		
10		1102	PLUG, 1/8-27 NPT, allen head	4	4		
 P Lycoming proprietary part. Listed for reference purposes only, cannot be purchased. * See latest revision of Service Instruction No. 1256 for service valve guides. • See latest revision of Service Instruction No. 1043. 							

CYLINDER SECTION

FIGURE 10 - CYLINDER ASSEMBLY



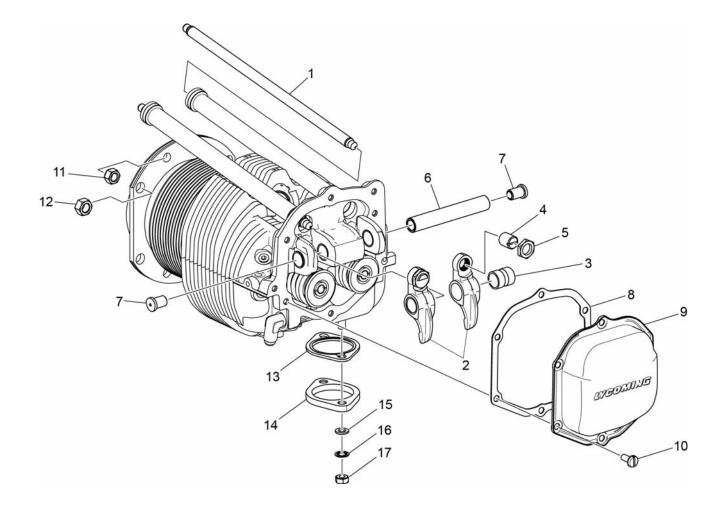
Valve Assembly and Related Parts Figure 11



Figure Co	Figure Item Code Part Number	Description		s per mbly	
item				L2A	L2C
1		17A23939	VALVE, Intake	4	4
2		17B23940	VALVE, Exhaust (rotator type)	4	4
3		LW-11795	SPRING, Valve, inner	8	8
4		LW-11800	SPRING, Valve, outer	8	8
5		LW-10077	SEAT, Valve spring, upper intake	8	8
6		65441	SEAT, Valve spring, lower intake	8	8
7		60009	KEY, Valve intake	16	16
8		60903	SHROUD TUBE ASSEMBLY, Push rod	8	8
9		LW-18661	SEAL, Shroud tube	16	16
10		62869	RING, Oil seal, 3/32 diameter x 4-3/8 I.D.	4	4

CYLINDER SECTION

FIGURE 11 – VALVE ASSEMBLY AND RELATED PARTS



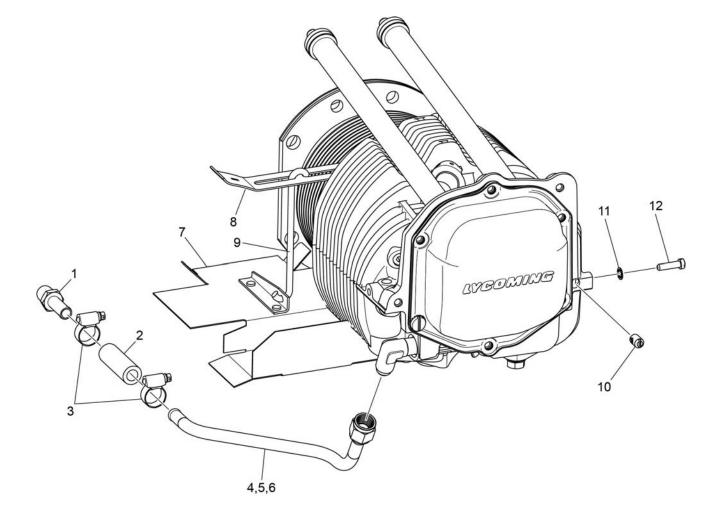
Cylinder Related Parts Figure 12



Figure C	Code Part Number	Description		s per embly			
ltem				L2A	L2C		
1	AR	15F22200	ROD ASSEMBLY, Push (A total of 8 required)	AR	AR		
2		60831	ROCKER ASSEMBLY, Valve	8	8		
3		74637	BUSHING, Valve rocker	8	8		
4		LW-19339	SCREW, Valve adjusting	8	8		
5		STD-587	NUT, 9/16-18 x 5/32 thick	8	8		
6		LW-13790	SHAFT, Valve rocker	4	4		
7		LW-12892	THRUST BUTTON, Rocker shaft	8	8		
8		75906	GASKET, Rocker box cover	4	4		
9		61247	COVER, Rocker box	4	4		
10		STD-1925	SCREW, 1/4-20 x 5/8 long, pan. head	24	24		
11		383-B	NUT, 3/8-24 plain	16	16		
12		STD-2106	NUT, 7/16-20 plain	16	16		
13		77611	GASKET, Exhaust flange	4	4		
14		61259	FLANGE, Exhaust, carbon		4		
15		STD-35	WASHER, 5/16 plain	8	8		
16		STD-475	WASHER, 5/16 lock, internal teeth	8	8		
17		STD-1410	NUT, 5/16-18 plain	8	8		
	AR as required <u>NOTE:</u> Various push rod lengths are used to set valve clearances.						

CYLINDER SECTION FIGURE 12 – CYLINDER RELATED PARTS





Cylinder Head Drain Tubes and Intercylinder Cooling Baffles Figure 13

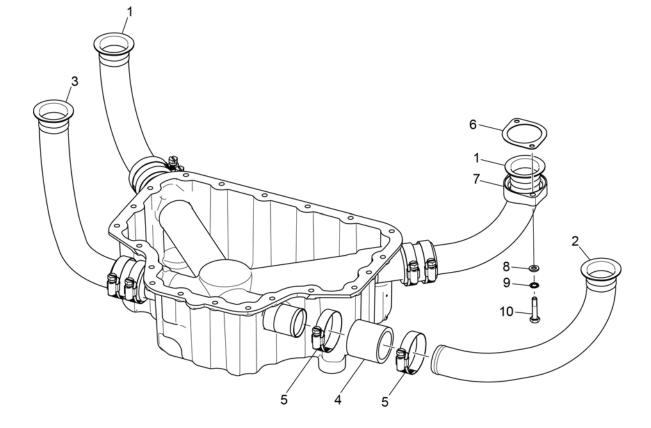


CYLINDER SECTION

FIGURE 13 -CYLINDER HEAD DRAIN TUBES AND INTERCYLINDER COOLING BAFFLES

Figure Item	Code	Code Part Number	Description	Units per Assembly	
item				L2A	L2C
1		STD-684	NIPPLE, Straight, 3/8 I.D. hose	4	4
2		STD-2180	HOSE, 3/8 I.D. x 1-7/8 long	4	4
3		LW-15592-5-05	CLAMP, Hose	8	8
4		60890	TUBE ASSEMBLY, Oil drain, cylinder no. 1	1	1
5		60821	TUBE ASSEMBLY, Oil drain, cylinder no. 2	1	1
6		60928	TUBE ASSEMBLY, Oil drain, cylinders no. 3 & 4	2	2
7		LW-13304	BAFFLE ASSEMBLY, Intercylinder	2	2
8		71611	RETAINER, Intercylinder baffle	2	2
9		LW-13303	HOOK, Intercylinder baffle retainer	2	2
10		65614	PLUG, Baffle attaching		3
11		STD-251	WASHER, No. 10, internal lock		3
12		STD-665	SCREW, No. 10-32 x 3/4 long, fill. head		3





Intake Pipes and Attaching Parts Figure 14

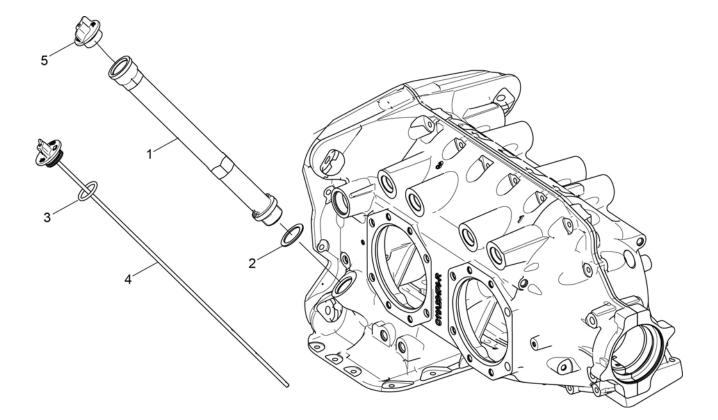


Figure	Code Part Numb	Part Number	Description		s per embly
ltem				L2A	L2C
1		LW-16728	PIPE, Intake, cylinders no. 1 & 2	2	2
2		LW-16730	PIPE, Intake, cylinder no. 3	1	1
3		LW-16729	PIPE, Intake, cylinder no. 4	1	1
4		STD-1196	HOSE, 1-1/2 I.D. x 1-15/16 O.D. x 1-13/16 long	4	4
5		LW-15592-8-28	CLAMP, Hose	8	8
6		71973	GASKET, 2 bolt flange, 1-13/16 I.D.	4	4
7		74360	FLANGE, Intake pipe, upper	4	4
8		STD-8	WASHER, 1/4 plain	8	8
9		STD-160	WASHER, 1/4 lock, internal teeth	8	8
10		LW-25-1.25	BOLT, 1/4-20 x 1-1/4 long, hex. head	8	8

CYLINDER SECTION

FIGURE 14 – INTAKE PIPES AND ATTACHING PARTS





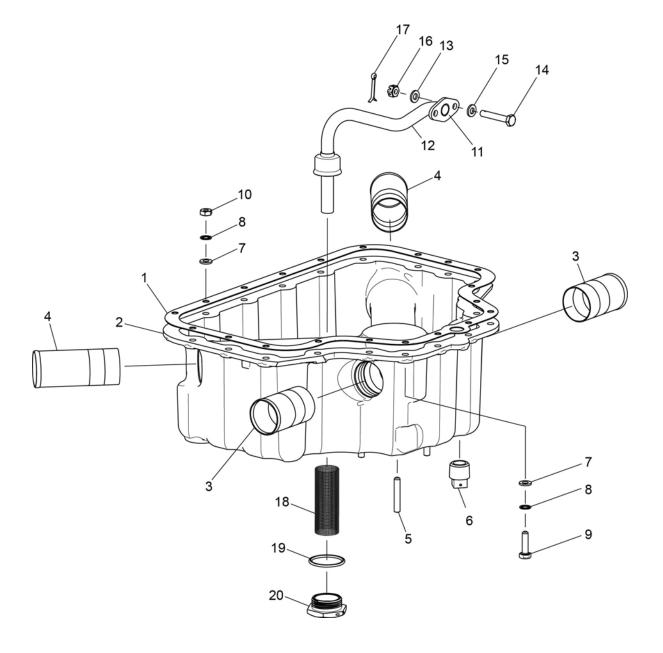
Oil Level Gage Assemblies Figure 15



Figure Item	Code Part Number	Description	Units per Assembly						
nem				L2A	L2C				
1		75736	TUBE, Oil level gage, 11-9/16 long	1	1				
		75735	TUBE, Oil level gage, 6-5/16 long		1				
2		72059	GASKET, Oil level gage	1	1				
3		74068	RING, Oil level gage	1	1				
4		LW-14752	GAGE ASSEMBLY, Oil level	1	1				
		LW-14792	GAGE ASSEMBLY, Oil level		1				
		LW-14751	GAGE ASSEMBLY, Oil level		1				
5		72842	PLUG, Oil level gage	1	1				

LUBRICATION SYSTEM

FIGURE 15 – OIL LEVEL GAGE ASSEMBLIES



Oil Sump Assembly and Oil Suction Screen Figure 16

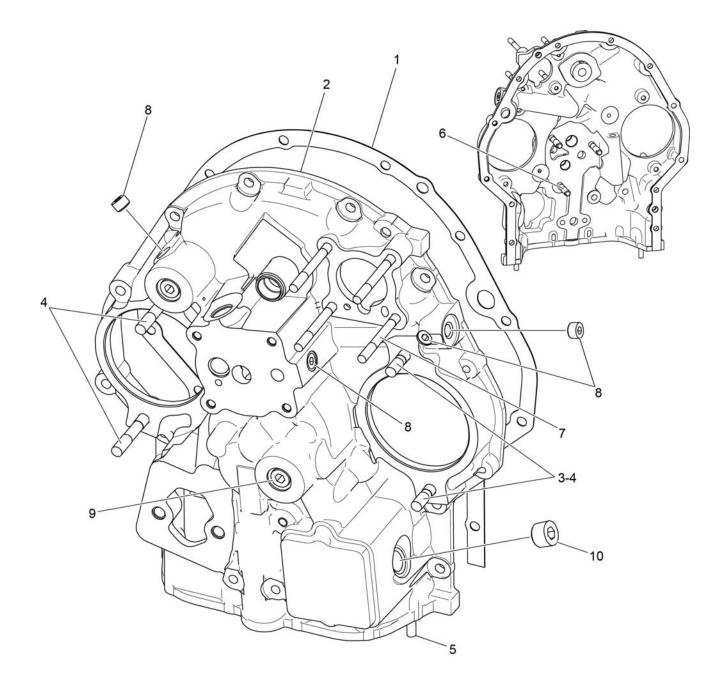


LUBRICATION SYSTEM

FIGURE 16 - OIL SUMP ASSEMBLY AND OIL SUCTION SCREEN

Figure Code	Code	Code Part Number	Description		s per embly
ltem	item			L2A	L2C
1		LW-13353	GASKET, Oil sump	1	1
2		LW-15688	SUMP ASSEMBLY, Oil	1	1
3		61376	CONNECTION, Intake pipe, front	2	2
4		61377	CONNECTION, Intake pipe, rear	2	2
5		25C-12	STUD, 1/4-20 x 1-1/2 long	4	4
6		STD-551	PLUG, 1/2-14 NPT, square head, drilled	1	1
7		STD-8	WASHER, 1/4 plain	32	32
8		STD-160	WASHER, 1/4 lock, internal teeth	20	20
9		LW-25-0.94	BOLT, 1/4-20 x 15/16 long, hex. head	18	18
10		STD-1411	NUT, 1/4-20 plain	14	14
11		60820	GASKET, Oil suction tube flange	1	1
12		61381	TUBE ASSEMBLY, Oil suction	1	1
13		STD-1227	WASHER, 1/4 plain	2	2
14		STD-1433	BOLT, 1/4-20 x 1-1/2 long, drilled	2	2
15		STD-8	WASHER, 1/4 plain	4	4
16		STD-2249	NUT, 1/4-20 slotted	2	2
17		STD-68	PIN, 1/16 diameter x 1/2 long	2	2
18		61378	SCREEN, Oil suction	1	1
19		06E19769-1.25	GASKET, Annular, 1-1/4 I.D.	1	1
20		61358	PLUG, 1-1/2 hex. head x 1-1/4-12	1	1

LYCOMING



Accessory Housing Assembly Figure 17

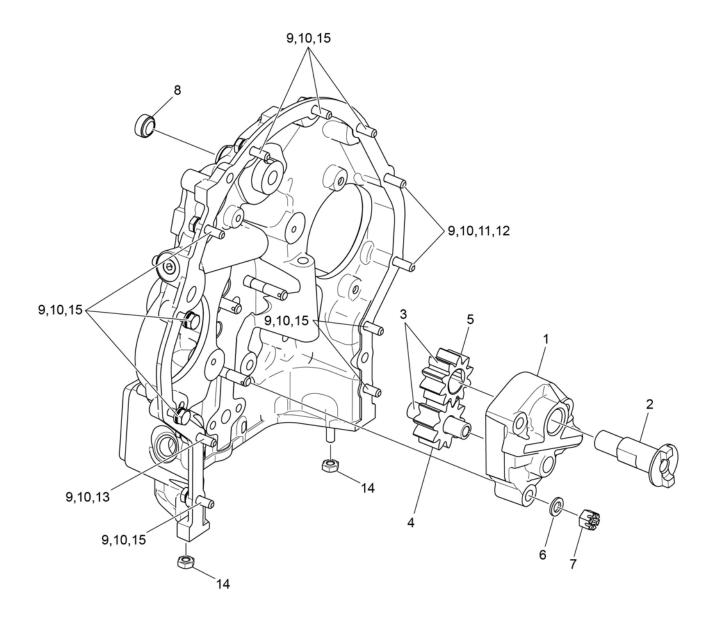
Effectivity: O-235-L2A, -L2C Series Engine Copyright, Lycoming Engines Lycoming Engines is a division of Avco Corporation



ACCESSORY DRIVES

FIGURE 17 – ACCESSORY HOUSING ASSEMBLY

Figure Cod	Code	Code Part Number	Description	Units per Assembly	
ltem				L2A	L2C
1		73818	GASKET, Accessory housing	1	1
2		21A23000-01	HOUSING ASSEMBLY, Accessory	1	1
		21A23000-03	HOUSING ASSEMBLY, Accessory		1
3		31C-12	STUD, 5/16-18 x 1-1/2 long	2	2
4		31C-19	STUD, 5/16-18 x 2-3/8 long	2	2
		31C-19	STUD, 5/16-18 x 2-3/8 long		4
5		61400	STUD, 1/4-20 x 2-3/16 long	2	2
6		31CD-17	STUD, 5/16-18 x 2-1/8 long	3	3
7		25C-22	STUD, 1/4-20 x 2-3/4 long	4	4
8		1102	PLUG, 1/8-27 NPT, allen head	4	4
9		STD-783	PLUG, 1/4-18 NPT, allen head	1	1
10		STD-784	PLUG, 3/8-18 NPT, allen head	1	1



Oil Pump Assembly and Accessory Housing Attaching Parts Figure 18

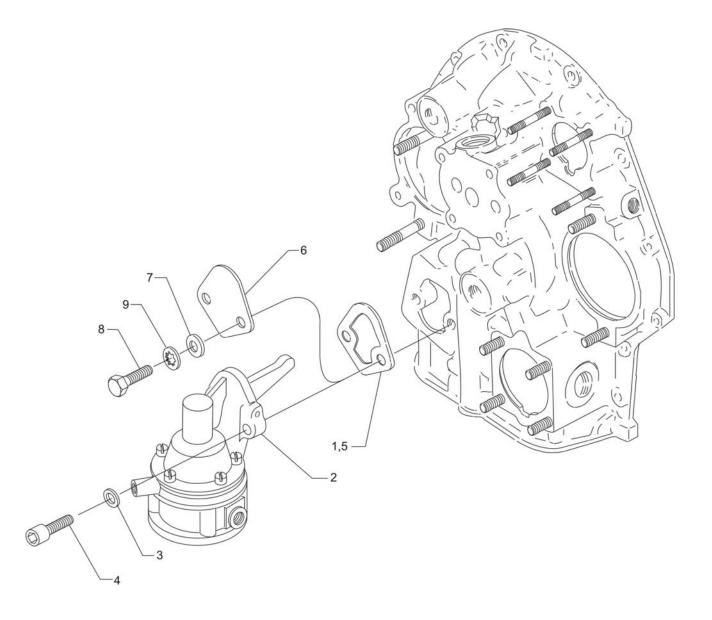


ACCESSORY DRIVES

FIGURE 18 - OIL PUMP ASSEMBLY AND ACCESSORY HOUSING ATTACHING PARTS

Figure Item	Code	Part Number	Description		s per embly		
item				L2A	L2C		
1		78531	BODY ASSEMBLY, Oil pump	1	1		
2		61174	SHAFT, Oil pump drive	1	1		
3		05K19423-S	IMPELLER KIT	1	1		
4	*	LW-18110	IMPELLER ASSEMBLY, Oil pump driven	1	1		
5	*	LW-18109	IMPELLER, Oil pump driven	1	1		
6		STD-35	WASHER, 5/16 plain	3	3		
7		STD-1420	NUT, 5/16-18 slotted	3	3		
8		LW-14260	SEAL, Oil, tachometer drive	1	1		
9		STD-8	WASHER, 1/4 plain	16	16		
10		STD-160	WASHER, 1/4 lock, internal teeth	12	12		
11		LW-25-1.63	BOLT, 1/4-20 x 1-5/8 long, hex. head	2	2		
12		LW-25-2.00	BOLT, 1/4-20 x 2.00 long, hex. head		2		
13		LW-25-1.13	BOLT, 1/4-20 x 1-1/8 long, hex. head	1	1		
14		STD-1411	NUT, 1/4-20 plain	2	2		
15		LW-25-0.94	BOLT, 1/4-20 x 15/16 long, hex. head	9	9		
* S(* Sold in complete sets only (Kit P/N 05K19423-S).						





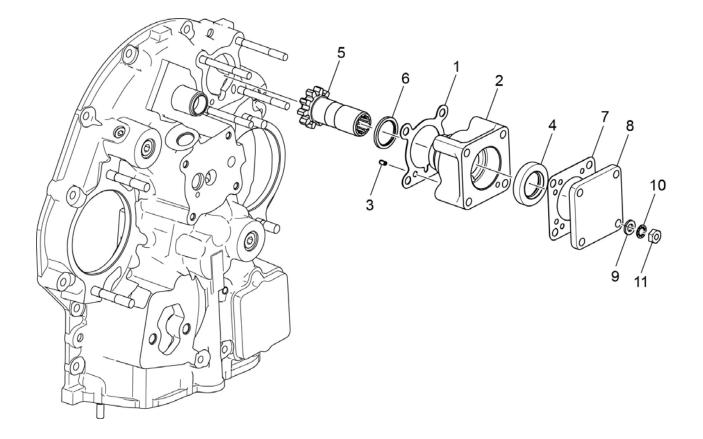
Fuel Pump Assembly and Attaching Parts Figure 19



ACCESSORY DRIVES

FIGURE 19 – FUEL PUMP ASSEMBLY AND ATTACHING PARTS

Figure Item	Code Par	Part Number	Description	Units per Assembly	
item				L2A	L2C
1		60096	GASKET, Fuel pump	1	1
2		LW-15472	FUEL PUMP, Dual diaphragm, low pressure	1	1
3		STD-33	WASHER, 3/8 plain	2	2
4		STD-1882	SCREW, 3/8-16 x 1-9/32 long, socket head, drilled	2	2
5		60096	GASKET, Fuel pump		1
6		03D23350	COVER, Fuel pump		1
7		STD-33	WASHER, 3/8 plain		2
8		LW-38-0.75	BOLT, 3/8-16 x 3/4 long, hex. head		2
9		STD-678	WASHER, 3/8 lock, internal teeth		2



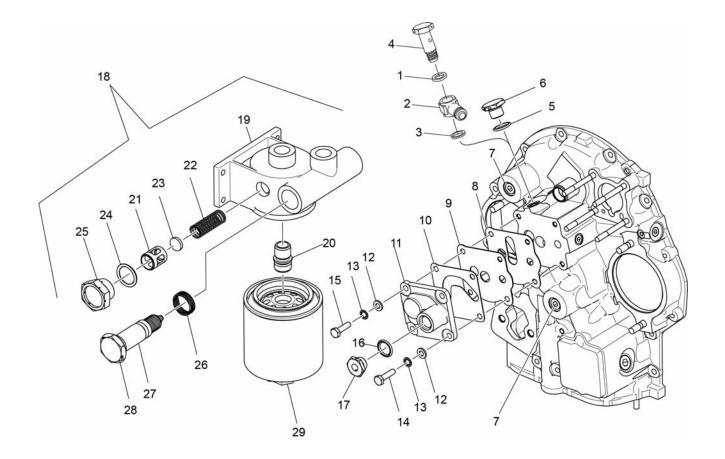
Vacuum Pump Drive and Cover Figure 20



FIGURE 20 – VACUUM PUMP DRIVE AND COVER								
Figure	Code	Part Number	Description		s per embly			
ltem				L2A	L2C			
1		61183	GASKET, Accessory adapter	1	1			
2		61098	ADAPTER ASSEMBLY, Vacuum pump	1	1			
3		STD-1774	PIN, 1/8 diameter x 1/4 long	1	1			
4		06A19956	OIL SEAL, 7/8 I.D. x 1-1/2 O.D. x 5/16 wide	1	1			
5		72970	GEAR ASSEMBLY, Vacuum pump driven	1	1			
6		71596	WASHER, Accessory drive gear	1	1			
7		8313	GASKET, Vacuum pump	1	1			
8		60430	COVER, Vacuum pump	1	1			
9		STD-8	WASHER, 1/4 plain	4	4			
10		STD-160	WASHER, 1/4 lock, internal teeth	4	4			
11		STD-1411	NUT, 1/4-20 plain	4	4			

ACCESSORY DRIVES

FIGURE 20 – VACUUM PUMP DRIVE AND COVER



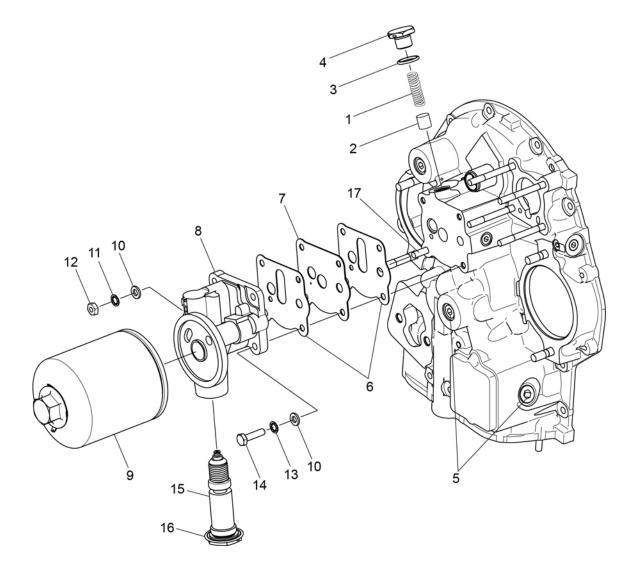
Oil Cooler Bypass Valve and Remote Oil Filter Figure 21



ACCESSORY DRIVES

FIGURE 21 – OIL COOLER BYPASS VALVE AND REMOTE OIL FILTER

Figure	Code	Code Part Number	Description		Units per Assembly	
Item				L2A	L2C	
1		71623	WASHER, Oil cooler fitting	1		
2		AS5163D08	ELBOW	1		
3		AN901-8A	GASKET, Metal tube connect seal	1		
4		71620	BOLT, 5/8-18 x 1-7/8 long	1		
5		06E19769-0.63	GASKET, Annular, 5/8 I.D.		1	
6		62417	PLUG, Oil cooler bypass		1	
7		STD-784	PLUG, 3/8-18 NPT, allen head	2	2	
8		06B23862	GASKET, Oil filter adapter	1	1	
9		LW-12999	PLATE, Oil filter adapter	1	1	
10		06B21644	GASKET, Oil filter base cover	1	1	
11		21M23736	COVER, Oil filter base	1	1	
12		STD-8	WASHER, 1/4 plain	4	4	
13		STD-160	WASHER, 1/4 lock, internal teeth	4	4	
14		LW-25-0.94	BOLT, 1/4-20 x 15/16 long, hex. head	3	3	
15		LW-25H1.00	BOLT, 1/4-20 x 1.00 long, hex. head, drilled	1	1	
16		06E19769-0.63	GASKET, Annular, 5/8 I.D.	1	1	
17		1540	PLUG, Thermometer well	1	1	
18		54J21208	ADAPTER ASSEMBLY, Oil filter remote	1	1	
19		54J21207	ADAPTER, Oil filter remote	1	1	
20		LW-16306	STUD, Oil filter	1	1	
21		77607	SLEEVE, Oil relief valve	1	1	
22		76542	SPRING, Oil relief valve	1	1	
23		76539	SEAT, Oil relief valve	1	1	
24		MS29512-12	SEAL, Oil	1	1	
25		03C21076	PLUG, Oil relief valve	1	1	
26		LW-10341	INSERT, 1.00-14 UNF x 3/8 long	1	1	
27		53E22144	VALVE ASSEMBLY, Temperature control oil cooler bypass	1	1	
28		76510	GASKET, Valve assembly	1	1	
29	V	LW-13906	OIL FILTER, Short V CH48103-1	1	1	



Oil Filter Assembly and Oil Cooler Bypass Valve Figure 22

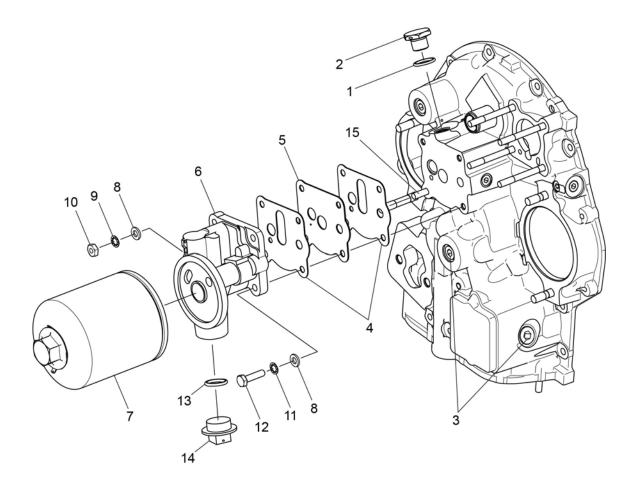


ACCESSORY DRIVES

FIGURE 22 - OIL FILTER ASSEMBLY AND OIL COOLER BYPASS VALVE

Figure Code Part Number Description	Description		s per embly					
item	nem			L2A	L2C			
1		69436	SPRING, Oil cooler bypass		1			
2		62415	PLUNGER, Oil cooler bypass		1			
3		06E19769-0.63	GASKET, Annular, 5/8 I.D.		1			
4		62417	PLUG, Oil cooler bypass		1			
5		STD-784	PLUG, 3/8-18 NPT, allen head		2			
6		06B23862	GASKET, Oil filter adapter		2			
7		LW-12999	PLATE, Oil filter adapter		1			
8		77852	OIL FILTER BASE ASSEMBLY		1			
9	v	LW-13215	OIL FILTER, Short V CH48110-1		1			
10		STD-8	WASHER, 1/4 plain		4			
11		STD-160	WASHER, 1/4 lock, internal teeth		1			
12		STD-1411	NUT, 1/4-20 plain		1			
13		STD-160	WASHER, 1/4 lock, internal teeth		3			
14		LW-25-1.00	BOLT, 1/4-20 x 1.00 long, hex. head		3			
15		53E22144	VALVE ASSEMBLY, Temperature control oil cooler bypass		1			
16		76510	GASKET, Valve assembly		1			
17		25C-11	STUD, 1/4-20 x 1-3/8 long		1			





Oil Filter Assembly and Oil Cooler Bypass Fittings (No Thermo Valve) Figure 23

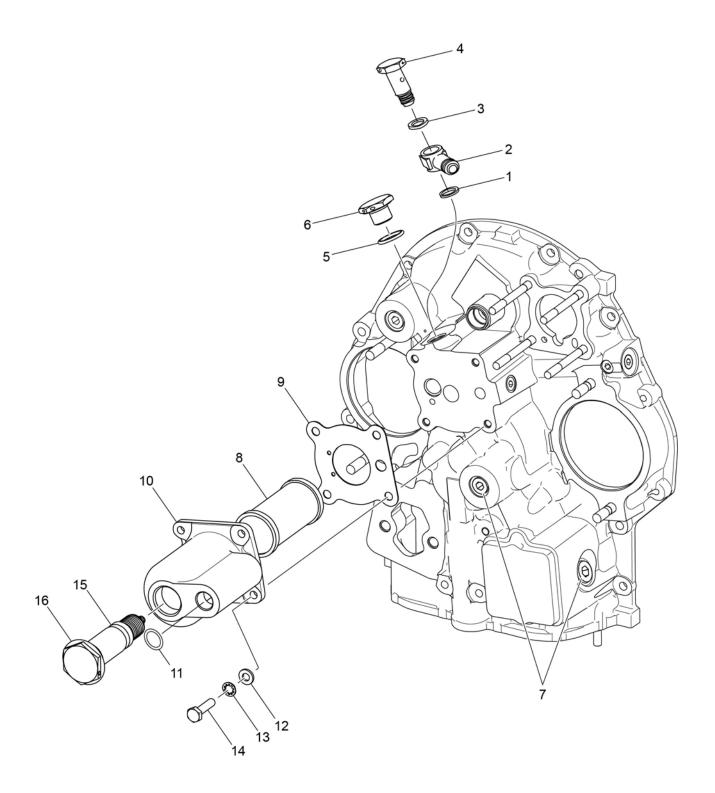


ACCESSORY DRIVES

FIGURE 23 - OIL FILTER ASSEMBLY AND OIL COOLER BYPASS FITTINGS (NO THERMO VALVE)

Figure	Figure Item Code	Part Number	Description		s per embly	
item				L2A	L2C	
1		06E19769-0.63	GASKET, Annular, 5/8 I.D.		1	
2		62417	PLUG, Oil cooler bypass		1	
3		STD-784	PLUG, 3/8-18 NPT, allen head		2	
4		06B23862	GASKET, Oil filter adapter		2	
5		LW-12999	PLATE, Oil filter adapter		1	
6		77852	OIL FILTER BASE ASSEMBLY		1	
7	v	LW-13215	OIL FILTER, Short V CH48110-1		1	
8		STD-8	WASHER, 1/4 plain		4	
9		STD-160	WASHER, 1/4 lock, internal teeth		1	
10		STD-1411	NUT, 1/4-20 plain		1	
11		STD-160	WASHER, 1/4 lock, internal teeth		3	
12		LW-25-1.00	BOLT, 1/4-20 x 1.00 long, hex. head		3	
13		06E19769-1,.00	GASKET, Annular, 1. 00 I.D.		1	
14		STD-1350	PLUG, 1.00-14 square head, drilled		1	
15		25C-11	STUD, 1/4-20 x 1-3/8 long		1	





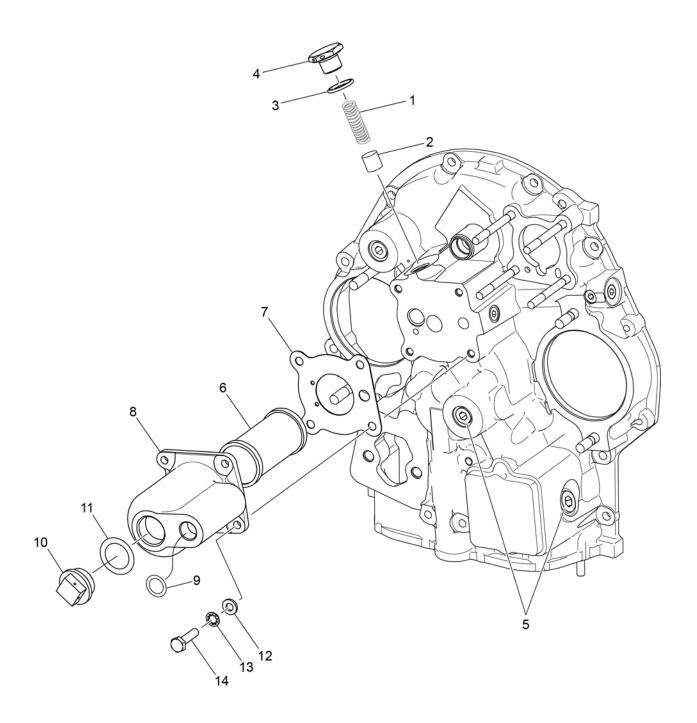
Oil Suction Screen and Oil Cooler Bypass Valve Figure 24



ACCESSORY DRIVES

FIGURE 24 - OIL SUCTION SCREEN AND OIL COOLER BYPASS VALVE

Figure	Figure Item Code	Part Number	Description		s per embly
item				L2A	L2C
1		71623	WASHER, Oil cooler fitting	1	
2		AS5163D08	ELBOW	1	
3		AN901-8A	GASKET, Metal tube connect seal	1	
4		71620	BOLT, 5/8-18 x 1-/78 long	1	
5		06E19769-0.63	GASKET, Annular, 5/8 I.D.	1	
6		62417	PLUG, Oil cooler bypass	1	
7		STD-784	PLUG, 3/8-18 NPT, allen head	2	
8		62817	SCREEN ASSEMBLY, Oil pressure	1	
9		61173	GASKET, Oil pressure housing	1	
10		69510	HOUSING, Oil pressure screen	1	
11		06E19769-0.63	GASKET, Annular, 5/8 I.D.	1	
12		STD-8	WASHER, 1/4 plain	4	
13		STD-160	WASHER, 1/4 lock, internal teeth	4	
14		LW-25-1.00	BOLT 1/4-20 x 1.00 long, hex. head	4	
15		53E22144	VALVE ASSEMBLY, Temperature control oil cooler bypass	1	
16		76510	GASKET, Valve assembly	1	



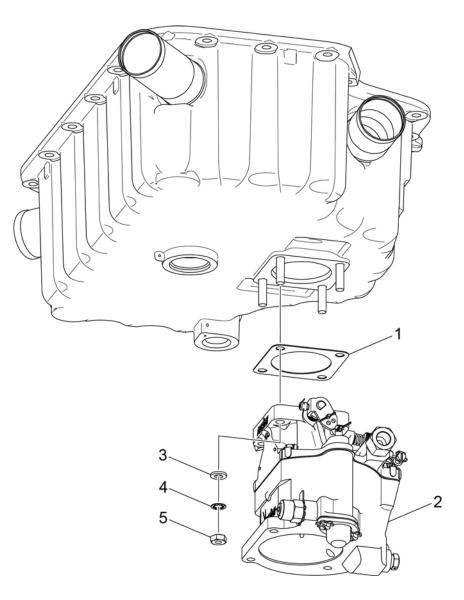
Oil Suction Screen and Oil Cooler Bypass Fittings (No Thermo Valve) Figure 25



ACCESSORY DRIVES

FIGURE 25 - OIL SUCTION SCREEN AND OIL COOLER BYPASS FITTINGS (NO THERMO VALVE)

Figure	Figure Item Code	Code Part Number	Description	Units per Assembly	
item				L2A	L2C
1		69436	SPRING, Oil cooler bypass		1
2		62415	PLUNGER, Oil cooler bypass		1
3		06E19769-0.63	GASKET, Annular, 5/8 I.D.		1
4		62417	PLUG, Oil cooler bypass		1
5		STD-784	PLUG, 3/8-18 NPT, allen head		2
6		62817	SCREEN ASSEMBLY, Oil pressure		1
7		61173	GASKET, Oil pressure housing		1
8		69510	HOUSING, Oil pressure screen		1
9		06E19769-1.00	GASKET, Annular, 1.00 I.D.		1
10		STD-1350	PLUG, 1.00-14 square head, drilled		1
11		06E19769-0.63	GASKET, Annular, 5/8 I.D.		1
12		STD-8	WASHER, 1/4 plain		4
13		STD-160	WASHER, 1/4 lock, internal teeth		4
14		LW-25-1.00	BOLT, 1/4-20 x 1.00 long, hex. head		1

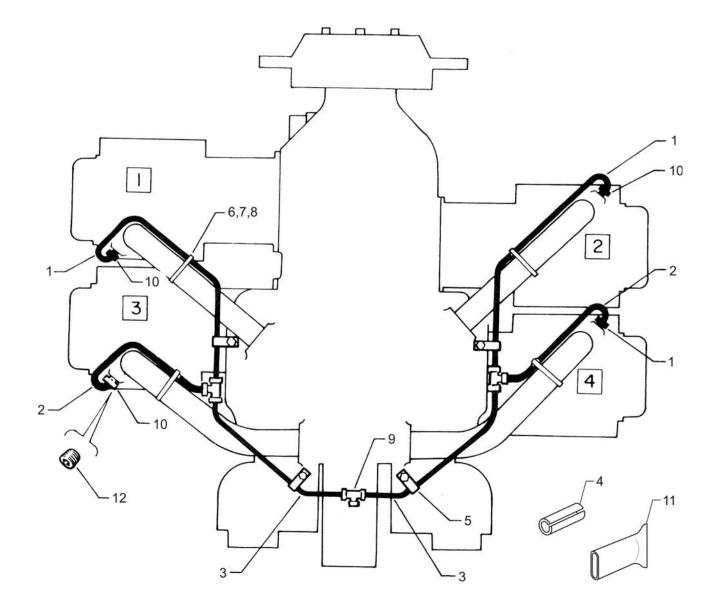


Carburetor Assembly Figure 26



Figure	Item Code Part Number Description	Code Part Number	Description		Units per Assembly	
item		L2A	L2C			
1		60592	GASKET, Carburetor	1	1	
2	v	61A26383	CARBURETOR, MA-3PA V AV 10-5220	1	1	
	V	LW-15496	CARBURETOR, MA-3PA V 10-5199		1	
	v	61A26385	CARBURETOR, MA-3PA V AV 105267		1	
3		STD-8	WASHER, 1/4 plain	4	4	
4		STD-160	WASHER, 1/4 lock, internal teeth	4	4	
5		STD-1411	NUT, 1/4-20 plain	4	4	

FUEL DISTRIBUTION IGURE 26 – CARBURETOR ASSEMBL



Priming Lines Figure 27

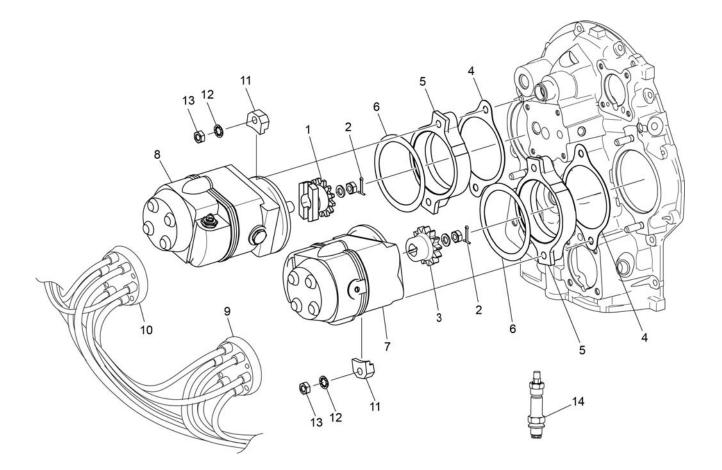


FUEL DISTRIBUTION

FIGURE 27 - PRIMING LINES

Figure	Figure Item Code	Part Number	Description		s per embly
nem				L2A	L2C
1		LW-12098-0-170	TUBE ASSEMBLY, Primer, cyls. no. 1 & 2	2	2
2		LW-12098-0-130	TUBE ASSEMBLY, Primer, cyls. no. 3 & 4	2	2
3		LW-12098-0-100	TUBE ASSEMBLY, Primer, intermediate	2	2
4		LW-12598	SLEEVE, Priming line	4	4
5		LW-16266-25-13	CLAMP	4	4
6		LW-18959-150-25	CLAMP, 1-1/2 I.D.	4	4
7		STD-553	SCREW, No. 6-32 x 1/2 long, round head	4	4
8		MS21044N06	NUT, No. 6-32 self-locking	4	4
9		STD-853	TEE, Union, 1/8 tube	3	3
10		63D21408	NIPPLE ASSEMBLY, Primer	4	4
11		61597	CAP, Sealing, 15/16 diameter x 1.00 long	1	1
12	*	1102	PLUG, 1/8-27 NPT, allen head (assemble in cylinder head)	4	4
* U	sed on en	gines without priming	g lines.		





Magnetos, Magneto Drives, Harnesses and Spark Plugs Figure 28



IGNITION DISTRIBUTION SYSTEM

FIGURE 28 -MAGNETOS, MAGNETO DRIVES, HARNESSES AND SPARK PLUGS

Figure Item	Code	Part Number	Description		s per embly
item				L2A	L2C
1		61665	GEAR, Magneto impulse	1	1
2		MS9245-44	COTTER PIN, 3/32 diameter x 5/8 long	2	2
3		68C19622	GEAR, Magneto	1	1
4		62224	GASKET, Magneto adapter	1	1
5		LW-12706	ADAPTER, Magneto, impulse coupling	1	1
		LW-12706	ADAPTER, Magneto, impulse coupling		2
6		LW-12681	GASKET, Magneto	2	2
7	v	66GP-0SANN	MAGNETO, Plain V 4370	1	1
8	v	66GC15SFNN	MAGNETO, Impulse V 4372	1	1
	v	66GC05SFNN	MAGNETO, Impulse V 4381		1
	v	66GC05SFNN	MAGNETO, Impulse V 4381		2
9	v	67P20428	HARNESS ASSEMBLY, Right, Slick V M2990	1	
	v	67P20406	HARNESS ASSEMBLY, Right, Slick V M2992		1
	v	67P20438	HARNESS ASSEMBLY, Right, Slick V M1905		1
10	v	67P20429	HARNESS ASSEMBLY, Left, Slick V M2989	1	
	v	67P20407	HARNESS ASSEMBLY, Left, Slick V M1795		1
	v	67P20437	HARNESS ASSEMBLY, Left, Slick V M1910		1
11		66M21195	CLAMP, Magneto	4	4
12		STD-475	WASHER, 5/16 lock, internal teeth	4	4
13		STD-1410	NUT, 5/16-18 plain	4	4
14	V *	1182-B7	SPARK PLUG, Champion V REM37BY	8	8
	**	01P19762-1-1	BAG, Harness attaching	1	
	**	01P19762-1-2	BAG, Harness attaching		1
	**	01P19762-1-43	BAG, Harness attaching		1

V Vendor Prime Manufacturer part

* Item 14 spark plugs are used in current production only. Additional spark plugs are available for this engine. See latest revision of Service Instruction No. 1042 for complete listing of all approved spark plugs.

** See page 56 for breakdown of individual parts contained in the magneto and harness attaching bag. These parts to be added by customer per engine line drawing included in each bag.



Part No.	Part Name	Qty.
LW-16266-25-25	CLIP, One wire	2
LW-14060	CLIP, Two wire	3
STD-8	WASHER, 1/4 plain	8
STD-1874	SCREW, 1/4 lock (rocker box)	6
76734	ZIP STRAP	8
LW-16266-25-50	CLIP, Four wire	1
STD-1411	NUT, 1/4-20 plain	2
STD-696	WASHER, 1/4 plain	4
STD-1916	SCREW, 1/4-20 x 1-1/8 long, fill. head	3
LW-M-2375	PLATE, Spark plug cable, two wire	2

01P19762-1-1 – Bag, Magneto Harness Attaching

01P19762-1-2 – Bag, Magneto Harness Attaching

Part No.	Part Name	Qty.
		4
LW-16266-25-25	CLIP, One wire	4
LW-14060	CLIP, Two wire	3
STD-8	WASHER, 1/4 plain	8
STD-1874	SCREW, 1/4 lock (rocker box)	6
76734	ZIP STRAP	8
LW-16266-25-50	CLIP, Four wire	1
STD-696	WASHER, 1/4 plain	4
STD-1916	SCREW, 1/4-20 x 1-1/8 long, fill. head	3
LW-M-2375	PLATE, Spark plug cable, two wire	2

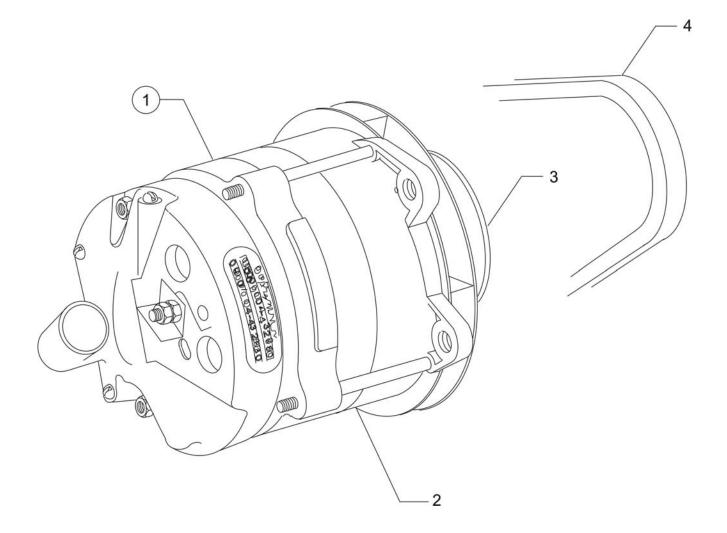
01P19762-1-43 - Bag, Magneto Harness Attaching

Part No.	Part Name	Qty.
LW-16266-25-25	CLIP, One wire	4
LW-14060	CLIP, Two wire	4
STD-8	WASHER, 1/4 plain	8
STD-1874	SCREW, 1/4 lock (rocker box)	6
76734	ZIP STRAP	8
LW-16266-25-50	CLIP, Four wire	1
STD-696	WASHER, 1/4 plain	4
STD-1916	SCREW, 1/4-20 x 1-1/8 long, fill. head	3
LW-M-2375	PLATE, Spark plug cable, two wire	2



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Alternator Assembly and Belt Figure 29

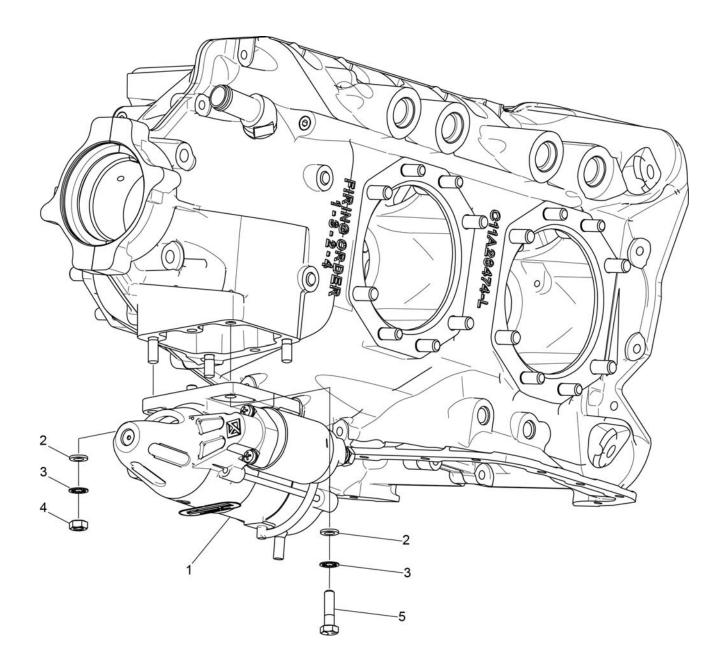
IGNITION SYSTEM DISTRIBUTION

FIGURE 29 - ALTERNATOR ASSEMBLY AND BELT

Figure Item	Code	Part Number	Description		s per mbly			
item				L2A	L2C			
1		LW-14371	ALTERNATOR ASSEMBLY, 12V-60Amp.	1	1			
		31C19553	ALTERNATOR ASSEMBLY, 24V-70Amp		1			
2	v	LW-14313	ALTERNATOR, 12V-60Amp. V ALY-8520-LS	1	1			
	v	LW-14326	ALTERNATOR, 24V-70Amp. V ALU-8521-LS		1			
3		36B19484	PULLEY, Alternator	1	1			
4		37A19773-372	BELT, Alternator drive, 3/8 wide	1				
		37A19773-376	BELT, Alternator drive, 3/8 wide	1	1			
V V								

Vendor Prime Manufacturer part

* See latest revision of Lycoming Service Instruction No. 1154 for complete listing of FAA approved starters, generators, alternators, regulators and relays.



Starter Motor and Attaching Parts Figure 30



Figure Item	Code	Part Number	Description		s per mbly
item				L2A	L2C
1	V	31A22102	STARTER, Sky-Tec V 122-12PM	1	1
	V	31A26043	STARTER ASSEMBLY, Kelly V ERZ-8012	1	1
	V	31A22361	STARTER, Lamar V PM-1203	1	
	V	31A22104	STARTER, Sky-Tec V 149-12LS		1
	V	31A22106	STARTER, Sky-Tec V 122-12LS		1
	V	31B22103	STARTER, Sky-Tec V 122-24PM		1
	V	31B26042	STARTER ASSEMBLY, Kelly V ERB-8012		1
2	*	STD-35	WASHER, 5/16 plain	4	4
3		STD-475	WASHER, 5/16 lock, internal teeth	4	4
4		STD-1410	NUT, 5/16-18 plain	3	3
5		LW-31-0.94	BOLT, 5/16-18 x 15/16 long, hex. head	1	1
	*	LW-31-1.16	BOLT, 5/16-18 x 1-5/32 long, hex. head	1	1

CRANKING SECTION

FIGURE 30 - STARTER MOTOR AND ATTACHING PARTS

NOTE: See latest revision of Lycoming Service Instruction No. 1154 for complete listing of FAA approved starters, generators, alternators, regulators and relays.



SERVICE KIT SECTION

SEAL AND GASKET SET

PART NO.	PART NAME	Qty.
61499-1	KIT - SEAL AND GASKET SET	1
LW-11632	RING, Oil seal	6
LW-12681	GASKET, Magneto	2
06B23862	GASKT, Oil filter adapter	2
LW-13353	GASKET, Oil sump	1
LW-13792	OIL SEAL, Crankshaft	1
LW-14260	OIL SEAL, Tachometer drive	1
LW-18639	LOCKPLATE, Crankshaft gear	1
LW-18661	SEAL, Shroud tube	16
77611	GASKET, Exhaust flange	4
06A19956	OIL SEAL, 7/8 I.D. x 1-1/2 OD x 5/16	1
06E19769-0.63	GASKET, Annular, 5/8 I.D.	2
06E19769-1.00	GASKET, Annular, 1.00 I.D.	1
06E19769-1.25	GASKET, Annular, 1-1/4 I.D.	2
60096	GASKET, Fuel pump	1
60592	GASKET, Carburetor	1
60820	GASKET, Oil suction tube flange	1
61173	GASKET, Oil pressure housing	1
61183	GASKET, Accessory adapter	1
61531	GASKET, Hydraulic valve	1
62224	GASKET, Magneto adapter	3
627869	RING, Oil seal, 3/32 diameter x 4-3/8 I.D.	4
68315	GASKET, Accessory drive adapter	1
71973	GASKET, 2 bolt flange, 1-13/16 I.D.	4
72053	GASKET, Governor	1
72059	GASKET, Oil level gage	1
72078	LOCKPLATE, 5/16 bolt x 1-11/32	2
72091	RING, Oil seal, 3/8 I.D. x 7/64 diameter	8
73383	LOCKPLATE, 5/16 bolt x 1.00	1
73817	LOCKPLATE, 1/4 bolt x 1-3/4	2
73818	GASKET, Accessory housing	1
74065	RING, Oil level gage seal	1
74068	RING, Oil level gage plug	1
75906	GASKET, Rocker box cover	4
76940	SEAL, Crankshaft oil	1
8313	GASKET, Vacuum pump	1

SERVICE KIT SECTION (CONT.)

CYLINDER, PISTON AND RING ASSEMBLY

PART NO.	PART NO. PART NAME			
05K23037	KIT - CYLINDER, PISTON AND RING ASSEMBLY	1		
16A26616	CYLINDER ASSEMBLY	1		
17A23939	VALVE, Intake	1		
17B23940	VALVE, Exhaust	1		
65441	SEAT, Valve spring, lower intake	2		
LW-11800	SPRING, Valve, outer	2		
LW-11795	SPRING, Valve inner	2		
LW-10077	SEAT, Valve spring, upper	2		
60009	KEY, Valve, intake	4		
STD-700	ELBOW, 90°, 3/8 flared tube	1		
1102	PLUG, 1/8-27 NPT, allen head	1		
LW-18729	PISTON	1		
78862	RING, Piston, compression	2		
78864	RING, Piston, oil	1		
LW-13445	PIN, Piston	1		
LW-11625	PLUG, Piston pin	2		
62869	RING, Oil seal, 3/32 diameter x 4-3/8 I.D.	1		
LW-18661	SEAL, Shroud tube	4		
75906	GASKET, Rocker box cover	1		
SSP-486	TAG, Use of piston LW-18729	1		
77611	GASKET, Exhaust flange	1		
71973	GASKET, 2 bolt flange	1		
1102	PLUG, 1/8-27 NPT, allen head	1		

CRANKCASE ASSEMBLY KIT

PART NO.	PART NAME	Qty.
11A26476-S	KIT - CRANKCASE ASSEMBLY	1
11A26476	CRANKCASE ASSEMBLY	1
AN842-12D	ELBOW, 3/4 NPT and 90°	1
1102	PLUG, 1/8-27 NPT, allen head	5



NUMERICAL INDEX

PART NO.	PART NAME	PAGE NO.	PART NO.	PART NAME	PAGE NO.
AN6-13	Bolt	1	LW-11900	Seat	19
AN6-14	Bolt	1	LW-12098-0-100	Tube Assy.	53
AN6-16	Bolt	1	LW-12098-0-130	Tube Assy.	53
AN6-21	Bolt	15	LW-12098-0-170	Tube Assy.	53
AN6-34A	Bolt	15	LW-12137	Guide	19
AN842-12D	Elbow	7	LW-12186	Nut	17
AN844-12D	Elbow	7	LW-12598	Sleeve	53
AN901-8A	Gasket	41	LW-12681	Gasket	55
AN901-8A	Gasket	47	LW-12706	Adapter	55
AS5163D08	Elbow	41	LW-12892	Thrust Button	23
AS5163D08	Elbow	47	LW-12999	Plate	41
LW-25-0.63	Bolt	13	LW-12999	Plate	43
LW-25-0.94	Bolt	31	LW-12999	Plate	45
LW-25-0.94	Bolt	35	LW-13215	Oil Filter	43
LW-25-0.94	Bolt	41	LW-13215	Oil Filter	45
LW-25-1.00	Bolt	43	LW-13303	Hook	25
LW-25-1.00	Bolt	45	LW-13304	Baffle Assy.	25
LW-25-1.00	Bolt	47	LW-13353	Gasket	31
LW-25-1.00	Bolt	49	LW-13445	Pin	17
LW-25-1.13	Bolt	5	LW-13675	Support Assy.	11
LW-25-1.13	Bolt	35	LW-13790	Shaft	23
LW-25-1.25	Bolt	1	LW-13792	Seal	9
LW-25-1.25	Bolt	3	LW-13906	Oil Filter	41
LW-25-1.25	Bolt	27	LW-13923	Bushing	17
LW-25-1.50	Bolt	5	LW-14260	Seal	35
LW-25-1.50	Bolt	15	LW-14313	Alternator	59
LW-25-1.63	Bolt	35	LW-14326	Alternator	59
LW-25-1.75	Bolt	1	LW-14371	Alternator Assy.	59
LW-25-1.75	Bolt	3	LW-14649	Shim	1
LW-25-1.75	Bolt	15	LW-14751	Gage Assy.	29
LW-25-2.00	Bolt	35	LW-14752	Gage Assy.	29
LW-25H1.00	Bolt	41	LW-14792	Gage Assy.	29
LW-25S1.50	Bolt	15	LW-15472	Fuel Pump	37
LW-31-0.94	Bolt	61	LW-15496	Carburetor	51
LW-31-1.16	Bolt	61	LW-15592-5-05	Clamp	25
LW-31H0.75	Bolt	1	LW-15592-8-28	Clamp	27
LW-31H0.88	Bolt	1	LW-15688	Sump Assy.	31
LW-31H0.88	Bolt	5	LW-16266-25-13	Clamp	53
	Bolt	37	LW-16306	Stud	41
LW-38-0.75	Seat	21	LW-16699	Seat	19
LW-10077					27
LW-10341	Insert	41	LW-16728	Pipe	
LW-10729	Link	5	LW-16729	Pipe	27
LW-11622	Stud		LW-16730	Pipe	27
LW-11623	Stud	7	LW-18085	Spring	9
LW-11625	Plug	17	LW-18109		35
LW-11713	Spring	9	LW-18110	Impeller Assy.	35
LW-11795	Spring	21	LW-18639	Lockplate	11
LW-11800	Spring	21	LW-18661	Seal	21

Numerical Index Page 64 December 2012 Effectivity: O-235-L2A, -L2C Series Engine Copyright, Lycoming Engines Lycoming Engines is a division of Avco Corporation



PART NO.	PART NAME	PAGE NO.	PART NO.	PART NAME	PAGE NO.
LW-18667	Pin	13	STD-551	Plug	31
LW-18729	Piston	17	STD-553	Screw	53
LW-18959-150-25	Clamp	53	STD-557	Dowel	7
LW-19339	Screw	23	STD-587	Nut	23
MS1044N06	Nut	53	STD-596	Nut	15
MS29512-12	Seal	41	STD-665	Screw	25
MS9245-44	Cotter Pin	55	STD-678	Washer	15
STD-8	Washer	1	STD-678	Washer	37
STD-8	Washer	3	STD-684	Nipple	25
STD-8	Washer	5	STD-690	Washer	1
STD-8	Washer	15	STD-700	Elbow	19
STD-8	Washer	27	STD-713	Cotter Pin	1
STD-8	Washer	31	STD-783	Plug	33
STD-8	Washer	35	STD-784	Plug	33
STD-8	Washer	39	STD-784	Plug	41
STD-8	Washer	41	STD-784	Plug	43
STD-8	Washer	43	STD-784	Plug	45
STD-8	Washer	45	STD-784	Plug	47
STD-8	Washer	47	STD-784	Plug	49
STD-8	Washer	49	STD-853	Tee	53
STD-8	Washer	51	STD-872	Nut	1
STD-33	Washer	15	STD-872	Nut	15
STD-33	Washer	37	STD-1065	Dowel	11
STD-35	Washer	1	STD-1196	Hose	27
STD-35	Washer	5	STD-1211	Plug	11
STD-35	Washer	23	STD-1227	Washer	31
STD-35	Washer	35	STD-1350	Plug	45
STD-35	Washer	61	STD-1350	Plug	49
STD-68	Pin	31	STD-1410	Nut	23
STD-160	Washer	1	STD-1410	Nut	55
STD-160	Washer	3	STD-1410	Nut	61
STD-160	Washer	5	STD-1411	Nut	1
STD-160	Washer	15	STD-1411	Nut	3
STD-160	Washer	27	STD-1411	Nut	5
STD-160	Washer	31	STD-1411	Nut	15
STD-160	Washer	35	STD-1411	Nut	31
STD-160	Washer	39	STD-1411	Nut	35
STD-160	Washer	41	STD-1411	Nut	39
STD-160	Washer	43	STD-1411	Nut	43
STD-160	Washer	45	STD-1411	Nut	45
STD-160	Washer	47	STD-1411	Nut	51
STD-160	Washer	49	STD-1420	Nut	35
STD-160	Washer	51	STD-1433	Bolt	31
STD-251	Washer	25	25C-11	Stud	43
STD-475	Washer	23	25C-11	Stud	45
STD-475	Washer	55	25C-12	Stud	31
STD-475	Washer	61	25C-22	Stud	33
STD-514	Dowel	7	31C-12	Stud	7



NUMERICAL INDEX (CONT.)

PART NO.	PART NAME	PAGE NO.	PART NO.	PART NAME	PAGE NO.
31C-12	Stud	19	62415	Plunger	43
31C-12	Stud	33	62415	Plunger	49
31C-13	Stud	7	62417	Plug	41
31C-19	Stud	33	62417	Plug	43
31CD-17	Stud	33	62417	Plug	45
38-13	Stud	7	62417	Plug	47
44-13	Stud	7	62417	Plug	49
383-B	Nut	23	62817	Screen Assy.	47
1028-B	Ball	9	62817	Screen Assy.	49
1102	Plug	7	62869	Ring	21
1102	Plug	19	65441	Seat	21
1102	Plug	33	65614	Plug	25
1102	Plug	53	66610	Bushing	19
1182-B7	Spark Plug	55	66796	Insert	19
1540	Plug	41	68668	Spring	9
8313	Gasket	39	69436	Spring	43
45530	Ring	13	69436	Spring	49
60009	Key	21	69510	Housing	47
60096	Gasket	37	69510	Housing	49
60430	Cover	39	71596	Washer	39
60592	Gasket	51	71611	Retainer	25
60803	Strap	15	71620	Bolt	41
60814-S	Bushing	10	71620	Bolt	47
60820	Gasket	31	71623	Washer	41
60821	Tube Assy.	25	71623	Washer	47
60831	Rocker Assy.	23	71973	Gasket	27
60882	Gear	11	72059	Gasket	29
60890	Tube Assy.	25	72091	Ring	9
60903	Shroud Tube Assy.	21	72842	Plug	29
60928	Tube Assy.	25	72970	Gear Assy.	39
61084	Spring	9	73757-S	Bushing	11
61098	Adapter Assy.	39	73817	Lockplate	13
61151	Shaft	13	73818	Gasket	33
61173	Gasket	47	74068	Ring	29
61173	Gasket	49	74360	Flange	27
61174	Shaft	35	74637	Bushing	23
61183	Gasket	39	74996	Gear Assy.	13
61247	Cover	23	75072	Gear Assy.	13
61259	Flange	23	75380	Link	1
61358	Plug	31	75706	Camshaft Assy.	13
61376	Connection	31	75708	Shaft Assy.	13
61377	Connection	31	75735	Tube	29
61378	Screen	31	75736	Tube	29
61381	Tube Assy.	31	75906	Gasket	23
61400	Stud	33	76510	Gasket	41
61597	Cap	53	76510	Gasket	41
61665	Gear	55	76510	Gasket	47
62224	Gasket	55	76534	Shim	1

Numerical Index Page 66 December 2012 Effectivity: O-235-L2A, -L2C Series Engine Copyright, Lycoming Engines Lycoming Engines is a division of Avco Corporation



PART NO.	PART NAME	PAGE NO.	PART NO.	PART NAME	PAGE NO.
76539	Seat	41	15B26091	Tappet Assy.	9
76542	Spring	41	15F22200	Rod Assy.	23
76943	Guide	19	16A26616	Cylinder Assy.	19
77309	Bushing	13	17A23939	Valve, Intake	21
77467	Spring	9	17B23940	Valve, Exhaust	21
77607	Sleeve	41	18D26100	Bearing	9
77611	Gasket	23	18M26104	Bearing	17
77808	Valve Assy.	9	21A23000-01	Housing Assy.	33
77852	Oil Filter Base Assy.	43	21A23000-03	Housing Assy.	33
77852	Oil Filter Base Assy.	45	21M23736	Cover	41
78027	Bolt	17	23D26777	Plunger	13
78030-S	Conn. Rod Assy.	17	31A22102	Starter	61
78158	Bracket	1	31A22104	Starter	61
78531	Body Assy.	35	31A22106	Starter	61
78662	Ring	17	31A22361	Starter	61
78864	Ring	17	31A26043	Starter Assy.	61
01P19762-1-1	Bag, Harness	55	31B22103	Starter	61
01P19762-1-2	Bag, Harness	55	31B26042	Starter Assy.	61
01P19762-1-43	Bag, Harness	55	31C19553	Alternator Assy.	59
03C21076	Plug	41	36B19484	Pulley	59
03D23350	Cover	37	37A19773-372	Belt	59
05K19423-S	Impeller Kit	35	37A19773-376	Belt	59
06A19956	Oil Seal	39	53E22144	Valve Assy.	41
06B21644	Gasket	41	53E22144	Valve Assy.	43
06B23862	Gasket	41	53E22144	Valve Assy.	47
06B23862	Gasket	43	54J21207	Adapter	41
06B13862	Gasket	45	54J21208	Adapter Assy.	41
06E19769-0.63	Gasket	41	61A26383	Carburetor	51
06E19769-0.63	Gasket	43	61A26385	Carburetor	51
06E19769-0.63	Gasket	45	63D21408	Nipple Assy.	53
06E19763-0.63	Gasket	47	66GC05SFNN	Magneto	55
06E19769-0.63	Gasket	49	66GC15SFNN	Magneto	55
06E19769-1.00	Gasket	45	66GP-0SANN	Magneto	55
06E19769-1.00	Gasket	49	66M21195	Clamp	55
06E19769-1.25	Gasket	9	67P20406	Harness Assy.	55
06E19769-1.25	Gasket	31	67P20407	Harness Assy.	55
07F23268	Strut	1	67P20428	Harness Assy.	55
11A26476	Crankcase Assy.	7	67P20429	Harness Assy.	55
11A26476-S	Crankcase Assy. Kit	7	67P20437	Harness Assy.	55
13B47431	Crankshaft Assy.	11	67P20438	Harness Assy.	55
13S19646	Gear	11	68C19622	Gear	55

NUMERICAL INDEX (CONT.)