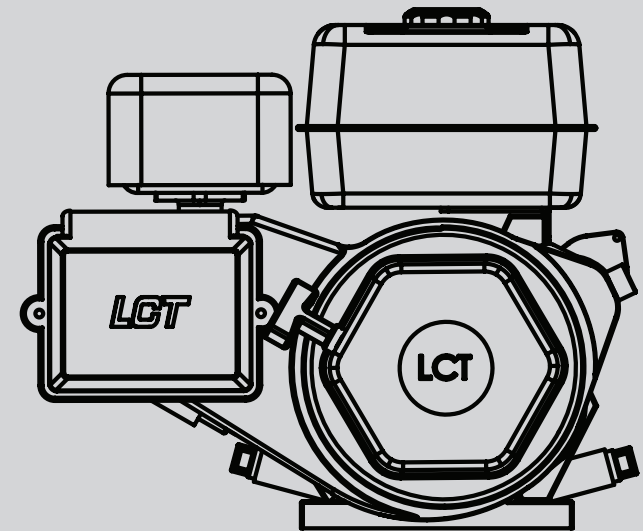
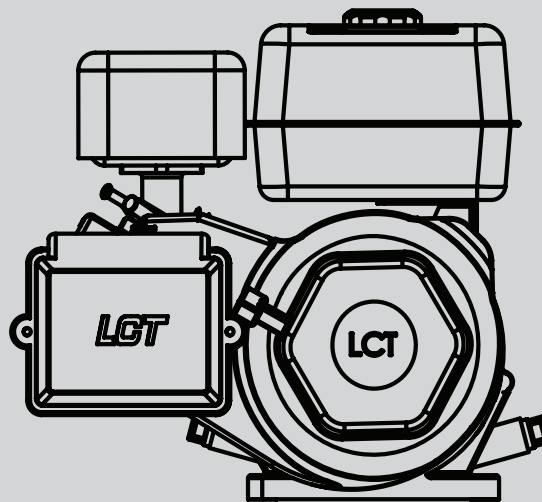
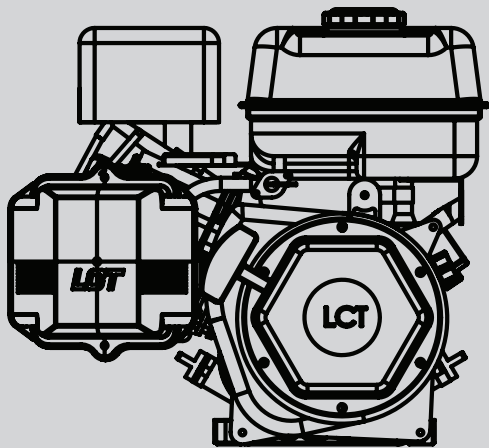


LCT Engines

Warranty Flat Rate Manual

178cc, 208cc, 254cc, 291cc, 414cc Gasoline Engines
PW SERIES / PLMH SERIES



LCT

LIQUID COMBUSTION TECHNOLOGY

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NOTE: Based upon the engine model number, certain repairs may/ may not be applicable and will depend on which components were used in the manufacturing process.

NOTE: Reference numbers with " * " require one or more critical gasket replacements. New gaskets will be shipped with the replacement component(s). The service repair shop is responsible for replacing the used gasket with a new gasket.

LCT Engines Flat Rate Manual

ENGINE LOWER

Job Description	179cc	208cc	254cc	291cc	414cc
Engine Removal and Reinstall	0.7	0.7	0.7	0.7	0.7
Cylinder/Crankcase Assembly (Warranty replacement requires authorization from LCT)	N/A	N/A	N/A	N/A	N/A
Crankshaft (Warranty replacement requires authorization from LCT)	N/A	N/A	N/A	N/A	N/A
Crankshaft Oil Seal: Output shaft side	0.2	0.2	0.2	0.2	0.2
Crankshaft Oil Seal: Flywheel side	1.2	1.2	1.2	1.2	1.2
Crankcase Cover Gasket	0.75	0.75	0.75	0.75	0.75
* Crankcase Cover	0.75	0.75	0.75	0.75	0.75
Balancer Shaft	N/A	N/A	N/A	N/A	1.0
Connecting Rod (Warranty replacement requires authorization from LCT)	N/A	N/A	N/A	N/A	N/A

Time displayed as fractions of hours

ENGINE UPPER

Job Description	179cc	208cc	254cc	291cc	414cc
Piston/ Rod Assembly (Warranty replacement requires authorization from LCT)	N/A	N/A	N/A	N/A	N/A
* Cylinder Head Assembly	1.0	1.0	1.0	1.0	1.0
Cylinder Head Gasket	1.1	1.1	1.1	1.1	1.1
Tappets	1.5	1.5	1.5	1.5	1.5
* Valve Cover	0.2	0.2	0.2	0.2	0.2
* Push Rods	0.5	0.5	0.5	0.5	0.5
* Camshaft	1.25	1.25	1.25	1.25	1.25
Rocker Arms	0.5	0.5	0.5	0.5	0.5

Time displayed as fractions of hours

BLOWER HOUSING/ RECOIL STARTER

Job Description	179cc	208cc	254cc	291cc	414cc
Blower Housing	0.3	0.3	0.3	0.3	0.3
Recoil Starter	0.2	0.2	0.2	0.2	0.2
Starter Cup	0.4	0.4	0.4	0.4	0.4

Time displayed as fractions of hours

LCT Engines Flat Rate Manual

GOVERNOR

Job Description	179cc	208cc	254cc	291cc	414cc
* Governor Gear (Includes weights, holders, sliders, etc.)	1.0	1.0	1.0	1.0	1.0
Governor Linkage	0.6	0.6	0.6	0.6	0.6
Governor Arm Shaft	0.8	0.8	0.8	0.8	0.8

Time displayed as fractions of hours

FLYWHEEL

Job Description	179cc	208cc	254cc	291cc	414cc
Flywheel Removal and Assembly	0.8	0.8	0.8	0.8	0.8
Flywheel Fan	0.6	0.6	0.6	0.6	0.6

Time displayed as fractions of hours

FUEL TANK

Job Description	179cc	208cc	254cc	291cc	414cc
Fuel Tank Assembly	0.3	0.3	0.3	0.3	0.3
Fuel Hose	0.25	0.25	0.25	0.25	0.25
Fuel Tank Cap	0.1	0.1	0.1	0.1	0.1
Fuel Tank Petcock	0.5	0.5	0.5	0.5	0.5

Time displayed as fractions of hours

CARBURETOR/ CHOKE ASSEMBLY

Job Description	179cc	208cc	254cc	291cc	414cc
* Carburetor Replacement	0.5	0.5	0.5	0.5	0.5
Choke Lever	0.3	0.3	0.3	0.1	0.1

Time displayed as fractions of hours

AIR CLEANER

Job Description	179cc	208cc	254cc	291cc	414cc
Air Filter Assembly	0.2	0.2	0.2	0.2	0.2
Air Filter Replacement	0.1	0.1	0.1	0.1	0.1
Carbon Canister	0.2	0.2	0.2	0.2	0.2

Time displayed as fractions of hours

EXHAUST

Job Description	179cc	208cc	254cc	291cc	414cc
* Exhaust Muffler (Includes gasket and heat shield)	0.3	0.3	0.3	0.3	0.3
Muffler Gasket	0.3	0.3	0.3	0.3	0.3
Exhaust Heat Shield	0.2	0.2	0.2	0.2	0.2
Muffler and Gasket	0.3	0.3	0.3	0.3	0.3

Time displayed as fractions of hours

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IGNITION/ ELECTRIC START

Job Description	179cc	208cc	254cc	291cc	414cc
Ignition Coil	0.8	0.8	0.8	0.8	0.8
Spark Plug	0.2	0.2	0.2	0.2	0.2
Electric Starter	0.3	1.0 (GEN I) 0.3 (GEN II)	0.3	1.0	1.0
CDI Box	0.7	0.7	0.7	0.7	0.7
Starter Solenoid	0.2	0.2	0.2	0.2	0.2

Time displayed as fractions of hours

SWITCHES

Job Description	179cc	208cc	254cc	291cc	414cc
* Oil Sensor Assembly	0.8	0.8	0.8	0.8	0.8
On/Off Switch	0.2	0.2	0.2	0.2	0.2

Time displayed as fractions of hours

GASKETS/OIL SEALS

Job Description	179cc	208cc	254cc	291cc	414cc
Carb Gasket	0.5	0.5	0.5	0.5	0.5
Cylinder Head	0.2	0.2	0.2	0.2	0.2
Crankcase Cover	0.2	0.2	0.2	0.2	0.2
PTO/Flywheel Oil Seal	0.2	0.2	0.2	0.2	0.2
Exhaust Gasket	0.2	0.2	0.2	0.2	0.2
Valve Cover	0.2	0.2	0.2	0.2	0.2

Time displayed as fractions of hours

NOTE: Replacement gaskets will be included automatically with repairs that require gasket removal.

SNOW

Job Description	179cc	208cc	254cc	291cc	414cc
Heater Box	0.5	0.5	0.5	0.5	0.5
Primer Bulb	0.2	0.2	0.2	0.2	0.2
Choke Lever (Snow)	0.5	0.5	0.5	N/A	N/A
On/Off Switch (Snow)	0.7	0.7	0.7	0.7	0.7

Time displayed as fractions of hours

Emissions Control System Warranty

United States Environmental Protection Agency (US EPA), and Liquid Combustion Technology, LLC (LCT) are pleased to explain the emission control system warranty on your small off-road engine. LCT must warrant the emission control system on your small off-road engine for the periods of time listed below provided there has been no abuse, neglect or improper maintenance of your small off-road engine.

MANUFACTURER'S WARRANTY COVERAGE

1995 and later small off-road engines are warranted for two years. If any emission-related part on your engine is defective, the part will be repaired or replaced by Liquid Combustion Technology, LLC.

OWNER'S WARRANTY RESPONSIBILITIES

As the small off-road engine owner, you are responsible for the performance of the required maintenance listed in your owner's manual. Liquid Combustion Technology, LLC recommends that you retain all receipts covering maintenance on your small off-road engine. Liquid Combustion Technology, LLC cannot deny warranty solely for the lack of receipts or for your failure to ensure the performance of all scheduled maintenance.

As the small off-road engine owner, you should however be aware that Liquid Combustion Technology, LLC may deny you warranty coverage if your small off-road engine or a part has failed due to abuse, neglect, improper maintenance or unapproved modifications.

You are responsible for presenting your small off-road engine to an authorized Liquid Combustion Technology, LLC service center as soon as a problem exists. The warranty repairs should be completed in a reasonable amount of time, not to exceed 30 days.

If you have any questions regarding your warranty rights and responsibilities, you should contact Liquid Combustion Technology, LLC at 1-877-274-2214.

GENERAL EMISSIONS WARRANTY COVERAGE

The warranty period begins on the date the engine or equipment is delivered to an ultimate Purchaser. Liquid Combustion Technology, LLC warrants to the ultimate purchaser and each subsequent purchaser that the engine is: (1) Designed, built, and equipped so as to conform with all applicable regulations adopted by the Air Resources Board pursuant to its authority in Chapters 1 and 2, Part 5, Division 26 of the Health and Safety Code; and, (2) Free from defects in materials and workmanship that cause the failure of a warranted part to be identical in all material respects to the part as described in the Liquid Combustion Technology, LLC's emission control system warranty manual for a period of two years. (3) Repair or replacement of any warranted part under the warranty provisions will be performed at no charge to the owner at a Liquid Combustion Technology, LLC service center.

The warranty on emissions-related parts will be interpreted as follows: Any warranted part that is not scheduled for replacement as required maintenance in the written instructions supplied must be warranted for the warranty period specified in (2) above. If any such part fails during the period of warranty coverage, it must be repaired or replaced by Liquid Combustion Technology, LLC according to (3) above. Any such part repaired or replaced under the warranty must be warranted for the remaining

warranty period. Any warranted part that is scheduled only for regular inspection in the written instructions supplied must be warranted for the warranty period specified in (2) above. A statement in such written instructions to the effect of "repair or replace as necessary" will not reduce the period of warranty coverage. Any such part repaired or replaced under warranty must be warranted for the remaining warranty period.

Any warranted part that is scheduled for replacement as required maintenance in the written instructions supplied must be warranted for the period of time prior to the first scheduled replacement point for that part. If the part fails prior to the first scheduled replacement, the part will be repaired or replaced by Liquid Combustion Technology, LLC according to (3) above. Any such part repaired or replaced under warranty will be warranted for the remainder of the period prior to the first scheduled replacement point for the part. Notwithstanding the provisions of (3) above, warranty services or repairs will be provided at all Liquid Combustion Technology, LLC's service centers that are franchised to service the subject engines. The owner will not be charged for diagnostic labor that leads to the determination that a warranted part is in fact defective, provided that such diagnostic work is performed at an authorized Liquid Combustion Technology, LLC service center.

Liquid Combustion Technology, LLC is liable for damages to other engine components proximately caused by a failure under warranty of any warranted part. Throughout the engine's warranty period defined in (2) above, Liquid

Combustion Technology, LLC will maintain a supply of warranted parts sufficient to meet the expected demand for such parts. Any replacement part may be used in the performance of any warranty maintenance or repairs and will be provided without charge to the owner. Such use will not reduce the warranty obligations of Liquid Combustion Technology, LLC. Add-on or modified parts may not be used. Such use will be grounds for disallowing a warranty claim. Liquid Combustion Technology, LLC will not be liable to warrant failures of warranted parts caused by the use of such an add-on or modified part.

Manufacturers Warranty Information

California Emission Control Warranty Statement

ENGINE OWNER WARRANTY POLICY

Effective date: June 1, 2003

MANUFACTURER'S LIMITED WARRANTY STATEMENT

Liquid Combustion Technology, LLC manufacturers its engines and equipment to the highest level of quality to bring our customers unparalleled owner satisfaction. Liquid Combustion Technology, LLC products are warranted to the original owner as follows:

WARRANTY COVERAGE

What is covered:

Liquid Combustion Technology, LLC will repair or replace any part or parts of the engine that are found to be defective in material or workmanship under normal use during the warranty period shown below. Warranty repairs or replacement will be made without charge for parts or labor.

How to obtain warranty service:

You must deliver your LCT engine, or the equipment, together with proof of original retail purchase date, at your expense, to an LCT engine dealer or distributor authorized to perform warranty repairs. To find the nearest authorized service center to you go to: www.lctusa.com and click on the SERVICE page to find the link or call 1-800-558-5402.

WARRANTY PERIOD

PRODUCTS	
Engines	See Owner's Manual

THERE IS NO OTHER EXPRESS WARRANTY MADE OR IMPLIED AND LIQUID COMBUSTION TECHNOLOGY, LLC DISCLAIMS ALL OTHER WARRANTIES, INCLUDING, WITHOUT LIMITATION, WARRANTIES OF PERFORMANCE, MERCHANTABILITY OR FITNESS FOR A PARTICULAR PURPOSE. IN NO EVENT AND

UNDER NO THEORY WHATSOEVER, SHALL LIQUID COMBUSTION TECHNOLOGY, LLC BE LIABLE FOR ANY HARM OR DAMAGE, WHETHER DIRECT, INDIRECT, CONSEQUENTIAL OR SPECIAL, SUFFERED BY OWNER. OWNER'S SOLE REMEDY SHALL BE THE REPAIR OR REPLACEMENT OF THE DEFECTIVE LIQUID COMBUSTION TECHNOLOGY, LLC COMPONENT, PART OR EQUIPMENT THEREOF, AT LIQUID COMBUSTION TECHNOLOGY, LLC'S DISCRETION, ALL IN ACCORDANCE WITH THIS WRITTEN LIMITED WARRANTY. LIQUID COMBUSTION TECHNOLOGY, LLC HAS NOT AUTHORIZED ANY PERSON TO MODIFY, ALTER OR EXPAND THE WARRANTIES CONTAINED IN THIS DOCUMENT.

LIMITATION OF LIABILITY

It is understood and agreed that Liquid Combustion Technology, LLC's liability and owner's sole remedy, whether in contract, under any warranty, in tort (including negligence) and strict liability or otherwise, shall not exceed the return of the amount of the purchase price paid by the owner and under no circumstances shall Liquid Combustion Technology, LLC be liable for any special, incidental or consequential damages, including, but not limited to, personal injury, property damage, damage to or loss of equipment, lost profits or revenue, costs of renting replacements and other additional expenses, even if Liquid Combustion Technology, LLC has been advised of the possibility of such damages. The price stated for the Liquid Combustion Technology, LLC product is a consideration in limiting Liquid Combustion Technology, LLC's Liability and owner's remedy. Some states do not allow the exclusion or limitation of incidental and consequential damages, and as such, the above language may not be applicable in such states that do not allow the exclusion or limitation of incidental and consequential damages. This Warranty gives you specific legal rights and you may also have other rights, which vary, from state to state.

YOUR WARRANTY RIGHTS AND OBLIGATIONS

The California Air Resources Board, United States Environmental Protection Agency (US EPA), and Liquid Combustion Technology, LLC (LCT) are pleased to explain the emissions control system warranty on your 2013 small off-road engine (SORE). In California, new small off-road engines must be designed, built and equipped to meet the State's stringent anti-smog standards. Liquid Combustion Technology, LLC must warrant the emission control system (EEC) on your small off-road engine for the periods of time listed below provided there has been no abuse, neglect or improper maintenance of your small off-road engine.

Your emission control system may include parts such as the carburetor or fuel tanks, fuel lines, fuel caps, valves, canisters, filters, vapor hoses, clamps, connectors, and other associated components.

MANUFACTURER'S WARRANTY COVERAGE

This emissions control system is warranted for two years. If any emissions-related part on your equipment is defective, the part will be repaired or replaced by Liquid Combustion Technology, LLC.

OWNER'S WARRANTY RESPONSIBILITIES

As the small off-road engine owner, you are responsible for the performance of the required maintenance listed in your owner's manual. Liquid Combustion Technology, LLC recommends that you retain all receipts covering maintenance on your small off-road engine, but Liquid Combustion Technology, LLC cannot deny warranty solely for the lack of receipts or for your

failure to ensure the performance of all scheduled maintenance.

As the small off-road engine owner, you should however be aware that Liquid Combustion Technology, LLC may deny you warranty coverage if your small off-road engine or a part has failed due to abuse, neglect, improper maintenance or unapproved modifications.

You are responsible for presenting your small off-road engine to a Liquid Combustion Technology, LLC distribution center as soon as a problem exists. The warranty repairs should be completed in a reasonable amount of time, not to exceed 30 days. If you have any questions regarding your warranty rights and responsibilities, you should contact LCT at: 1-877-274-2214

General Emissions Warranty Coverage

YOUR WARRANTY RIGHTS AND OBLIGATIONS

Liquid Combustion Technology, LLC's application for certification warrants to the ultimate purchaser and each subsequent purchaser that the engine is:

- (1) Designed, built, and equipped so as to conform with all applicable regulations and,
- (2) Free from defects in materials and workmanship that cause the failure of a warranted part to be identical in all material respects to the part as described in the Liquid Combustion Technology, LLC's application for certification.

WARRANTY PERIOD

The warranty period begins on the date the engine or equipment is delivered to an ultimate purchaser or first placed in service. The warranty period is two years.

WARRANTY COVERAGE FOR EMISSIONS-RELATED PARTS

Subject to certain conditions and exclusions as stated below, the warranty on emission-related parts is as follows:

- (1) Any warranted part that is not scheduled for replacement as required maintenance in the written instructions supplied is warranted for the warranty period stated above. If the part fails during the period of warranty coverage, the part will be repaired or replaced by Liquid Combustion Technology, LLC according to subsection (4) below. Any such part repaired or replaced under the warranty will be warranted for the remaining warranty period.
- (2) Any warranted part that is scheduled only for regular inspection in the written instructions supplied is warranted for the warranty period stated above. Any such part repaired or replaced under warranty will be warranted for the remaining warranty period.
- (3) Any warranted part that is scheduled for replacement as required maintenance in the written instructions supplied is warranted for the period of time before the first scheduled replacement date for that part. If the part fails prior to the first scheduled replacement, the part will be repaired or replaced by Liquid Combustion Technology, LLC's according to (4) below. Any such part repaired or replaced under warranty will be warranted for the remainder of the period prior to the first scheduled replacement point for the part.
- (4) Repair or replacement of any warranted part under the warranty provisions herein will be performed at a warranty station at no charge to the owner.

- (5) Notwithstanding the provisions of herein, warranty services or repairs will be provided at all Liquid Combustion Technology, LLC's distribution centers that are franchised to service the subject engines.
- (6) The owner will not be charged for diagnostic labor that is directly associated with diagnosis of a defective, emission-related warranty part, provided that such diagnostic work is performed at a warranty station.
- (7) Liquid Combustion Technology, LLC is liable for damages to other engine components proximately caused by a failure under warranty of any warranted part.
- (8) Throughout the engine's warranty period defined above, Liquid Combustion Technology, LLC will maintain a supply of warranted parts sufficient to meet the expected demand for such parts.
- (9) Any replacement part may be used in the performance of any warranty maintenance or repairs and will be provided without charge to the owner. Such use will not reduce the warranty obligations of Liquid Combustion Technology, LLC.
- (10) Add-on or modified parts that are not exempted by the Air Resources Board may not be used. The use of any non-exempted add-on or modified parts by the ultimate purchaser will be grounds for disallowing a warranty claim. Liquid Combustion Technology, LLC will not be liable to warrant failures of warranted parts caused by the use of such an add-on or modified part.

Warranted Parts

The repair or replacement of any warranted part otherwise eligible for warranty coverage may be excluded from such warranty coverage if Liquid Combustion Technology, LLC demonstrates that the engine or equipment has been abused, neglected, or improperly maintained, and that such abuse, neglect, or improper maintenance was the direct cause of the need for repair or replacement of the part. That notwithstanding, any adjustment of a component that has a factory installed, and properly operating, adjustment limiting device is still eligible for warranty coverage. The following emission warranty parts lists are covered if factory installed:

- (1) Fuel Metering System
 - (i) Carburetor and internal parts (and/or pressure regulator or fuel injection system)
 - (ii) Air/fuel ratio feedback and control system
 - (iii) Cold start enrichment system
- (2) Air Induction System
 - (i) Controlled hot air intake system
 - (ii) Intake manifold
 - (iii) Air filter
- (3) Ignition System
 - (i) Spark plugs
 - (ii) Magneto or electronic ignition system
 - (iii) Spark advance/retard system
- (4) Exhaust Gas Recirculation (EGR) System
 - (i) EGR valve body, and carburetor spacer if applicable
 - (ii) EGR rate feedback and control system
- (5) Air Injection System
 - (i) Air pump or pulse valve
 - (ii) Valves affecting distribution of flow
 - (iii) Distribution manifold
- (6) Catalyst or Thermal Reactor System
 - (i) Catalytic converter
 - (ii) Thermal reactor
 - (iii) Exhaust manifold
- (7) Particulate Control Traps
 - (i) Filters, precipitators, and any other device used to capture particulate emissions
- (8) Miscellaneous Items Used in Above Systems

- (i) Vacuum, temperature, and time sensitive valves and switches
 - (ii) Electronic controls
 - (iii) Hoses, belts, connectors, and assemblies
- (9) Evaporative Emissions Components
 - (i) Fuel Line
 - (ii) Fuel Line Clamps
 - (iii) Fuel Tank and Fuel Cap
 - (iv) Carbon Canister and connecting parts
 - (v) ROV

If you have any questions regarding your warranty rights and responsibilities, you should contact:

Liquid Combustion Technology, LLC
100 Roe Road
Travelers Rest, SC 29690
Phone : 1-877-274-2214
Manufactured by
Liquid Combustion Technology, LLC

LCT

LIQUID COMBUSTION TECHNOLOGY

Liquid Combustion Technology

| Phone: 877.274.2214 |