

# **BL Motorcycles Ltd**

*Professional Workshop Manual - English Translation*

## **CFMoto - CFMoto Moto Leader CF150-A. Service Manual.English.2011**

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CF150-A Service Manual

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Zhejiang CFMOTO Power Co., Ltd.  
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### **FOREWORD**

This manual introduces CF150-A maintenance information, disassembly procedure, check & adjustment methods, troubleshooting and technical specifications. There are illustrations, drawings to guide your operations.

Chapter 1 mainly introduces general operation information, tools, vehicle structure and basic specifications.  
Chapter 2 mainly introduces check & adjustment methods and how to do vehicle maintenance.  
Chapter 3 mainly introduces disassembly, installation, adjustment, maintenance and trouble-shooting information.

CFMOTO reserves right to make improvements and modifications to the products without prior notice. Overhaul and maintenance should be done according to actual condition of vehicle.

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Conversion table  
Item Example Conversion  
Pressure 200 kPa(2.00kgf/cm<sup>2</sup>) 1kgf/cm<sup>2</sup>=98.0665kPa 1kpa=1000Pa

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33kPa (250mmHg) 1mmHg=133.322Pa=0.133322kPs

Torque 18N.m(1.8kgf-m) 1kgf.m=9.80665N.m

Volume 419ml 1ml=1cm<sup>3</sup>=1cc

1l=1000cm<sup>3</sup>

Force 12N(1.2kgf) 1kgf=9.80665N

## 1-1 Maintenance information (Chassis)

### Notes during operation

Cautions: Exhaust contains toxic ingredients. Do not run the engine in closed places or places with poor ventilation for a long time.

Cautions: The liquor (dilute sulfuric acid) in Battery is strong corrosive; it may burn the skin and blind the eyes when it contacts them. In case of contact, please wash it with a great deal of clear water immediately, and receive medical treatment in hospital. Besides, please also wash it by a great deal of clear when it contacts the clothes, for avoiding skin burn. The Battery and Battery liquor must be stored strictly, away from where children can touch.

Cautions: Uniform (pilot uniform etc), cap, safety boots suitable for the operation must be worn, and the safety articles such as dustproof goggles, dustproof respirator and gloves shall be worn for protection when necessary.

Cautions: When the engine just stops, the temperature of engine, muffler is still high; please do not touch them with bare hands, for avoiding burn. Please wear uniform with long sleeves as well as gloves when maintaining.

Cautions: The coolant is poisonous, please do not drink it, do not let it contact the skin, eyes neither clothes. In case it contacts the skin or clothes, please suds it immediately. When it contacts the eyes, please wash it thoroughly with a great deal of clear water immediately, and receive medical treatment in hospital. In case the coolant is drunk by mistake, please try to vomit it out, and receive medical treatment immediately after gargling. The coolant must be stored strictly, away from where children can touch.

Cautions: No smoking or naked fire is allowed at the operation site, for the gasoline is combustible. Not only flames, but electric sparks shall be avoided. Besides, the vaporized gasoline is explosive, please operate it in the place with nice ventilation.

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### 1-2

Cautions: The Battery may produce combustible and explosive hydrogen when it is being charged. So it may explode if there is flame or electric spark. So please charge it in the place with nice ventilation.

Cautions: do not let the turning or movable pieces such as rear wheel, clutch etc clip your hands or clothes when maintaining.

Cautions: The asbestos dust on the brake drum is carcinogenic is breathed in. Do not clean off the dust with compressed air. Use cleaning detergent to avoid dust proliferation.

Cautions: The personnel shall make them be aware of each other from time to time when operating, for safety

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confirmation.

## 1-3 Maintenance information (Chassis)

### Cautions to disassembly, assembly

The parts, lubricant and grease must adopt the pure parts of Chunfeng Brand or recommendation.

The parts of each system shall be arranged and stored separately, so that the parts can be assembled to the original places.

The parts shall be washed and the cleanser shall be blown away by compressed air prior to determination when they are disassembled and inspected. The working surface shall be lubricated before assembly.

Insert and arrange the bolts one by one and make sure the insertion volume of each bolt is equal before inserting them, when the bolt length is unidentified.

Please clean the dirt, dusts on the vehicle before maintenance.

The gasket, O-ring, piston pin retainer and split pin must be renewed after disassembly.

The elastic retainer will deform if it is opened too wide upon disassembly, then it will easily fall off when assembled again. Please do not use the elastic retainer that is already loose and without elasticity.

Inspect the necessary sites upon disassembly, measure the relevant data, so that the original status can be resumed after assembly.

The fasteners such as bolts, nuts and screws shall be pre-fastened, and then be fastened on the diagonal according to regulated fastening torque in the principle of from big to small, from inside to outside.

## 1-4

The rubber parts shall be checked whether they are aged upon disassembly, renew them in advance when necessary. Besides, try not to make volatile oil, grease etc attach on the rubber parts, for they are not resistant to corrosion of gasoline or kerosene.

Proper special tools must be applied to the operations which require special tools.

The inside or outside track of ball bearing shall be turned manually, for confirming the flexibility and smoothness of turning.

The parts that are loose axially or radially shall be renewed.

The parts that are unsmooth shall be washed with oil, and the parts that are not repaired after washing shall be renewed (the dual-side dustproof type cannot be washed)

Press it into the machine or axis, and the bearing shall be renewed if the pressed part is not tight enough.

Do not let the bearing race turn back when blowing the ball bearing by compressed air after washing. If the bearing race turns back, its high back turning speed will be beyond the limit that may result in damage of bearing.

The bearing shall be lubricated with engine oil or grease before assembly.

The recommended lubricating grease must be applied or injected in the appointed positions.

When disassembling the pressed ball bearing, the disassembled bearing must not be used again if the balls are forced for disassembly.

The installation direction of single-sided dustproof bearing shall be paid attention to upon disassembly. The surface of open-type or dual-side dustproof bearing that is with the sign of manufacturer, dimensions shall face outside upon installation.

The side with chamfer shall face the impact direction when installing the circlip. The circlip that is loose already or without elasticity shall not be used again. Rotate the circlip after assembly, for confirming that it is installed in the groove properly.

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## **1-5 Maintenance information (Chassis)**

Each fastening part must be inspected whether they are tightened and work well after assembly.

Install oil seal with the side of manufacturers mark outward.

.do not fold or scratch the oil seal lip.

.apply grease to the oil seal lip before assembling.

Do not mix mud or dust into engine or the hydraulic brake system.

Do not twist or bend the cables too much. Distorted or damaged cables may cause poor operation.

Brake fluid and coolant may damage coating, plastic and rubber parts. Flush these parts with water if splashed.

When installing pipes, insert the pipe till the end. Fit the pipe clip, if any, into the groove. Replace the pipes or hoses that cannot be tightened.

Clean the gaskets and washers of the engine cases before assembling. Remove the scratches on the contact surfaces by polishing evenly with an oilstone.

When assembling the parts of protection caps, insert the caps to the grooves, if any.

## **1-6**

Location of VIN No. and Engine No.

Model: CF150-A

VIN No.: LCEPDKL2XXXXXX

Engine serial No.:157MJ-2A