RedMoto

USE AND MAINTENANCE MANUAL

- CRF 450 RX ENDURO
- CRF 450 RXC SUPERMOTO
- CRF 400 RX ENDURO
- CRF 250 R ENDURO

HONDA

Read this manual thoroughly to fully understand the operation of the vehicle. The operation and maintenance manual is an integral part of the vehicle and shows only the information about the road components of the bike; for any other technical information please refer to the **HONDA USER MANUAL**.

Inside the **OPERATION AND MAINTENANCE** are included the instructions for operation, testing, maintenance of the vehicle and safety conditions to be met.

The company RedMoto SRL reserves all rights to make changes to its products without compromising functionality shown here. The company RedMoto SRL assumes no responsibility for any damage caused from misunderstanding of this manual.

For every misunderstanding and doubt please contact your dealer RedMoto.

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FINAL NOTE

We need to give priority to safety and to compliance with the rules both for those who lead the motorcycle and for the world around them.

And 'therefore necessary to follow some useful tips such as:

- get to know the vehicle before using
- know the traffic rules
- learn about the maintenance status of the vehicle and its planned programs
- Use protective clothing and helmet
- Be familiar during the riding of the vehicle

Each RedMoto dealer is available to suit every need of the final consumer as:

- performing periodic maintenance
- supply and install spare parts and optional

The motorcycle is delivered in accordance with the legal limit in force in the European community; therefore the user of the vehicle is required to carry out compliance audits to comply with anti-noise and anti-pollution.

To drive this motorcycle is necessary to meet the legal requirements (minimum age, insurance, license plate, state taxes).

Make sure you are psycho - physically fit to drive, avoid taking alcohol, drugs or psychotropic substances.

Know the signs and local traffic regulations is a prerequisite for driving the motorcycle.

When you are driving evaluate conditions: visibility, road grip, traffic, presence of obstacles. Respect and maintain the safety distances.

Lead the motorcycle in the correct riding position, adjust the handlebars and controls in order to avoid fatigue driving.

Eat, drink, read, use the phone, operations are highly discouraged when driving.

In case of damage caused by accidents or falls, it is necessary that one RedMoto dealer analyze the overall condition of the vehicle and check that there are no damages that compromise the general use of the medium and its security.

According to the rules of the road it is strictly forbidden to change the position, angle, and color of the plate, lights, horn and turn signals system.
No modifications are finalized to enhance and / or lighten the vehicle.
Always refer to the laws and regulations regarding the equipment of the vehicle.

Tampering and modifications to the original motorcycle will affect the operation, the warranty will lapse and consequently decrease the overall safety of the vehicle and may no longer be suitable for use on public roads.

ENDURO

- CRF 450 RX ENDURO
- CRF 400 RX ENDURO
- CRF 250 R ENDURO

SUPERMOTO

- CRF 450 RXC SUPERMOTO

RANGE OF VEHICLES – CRF 450 RX ENDURO

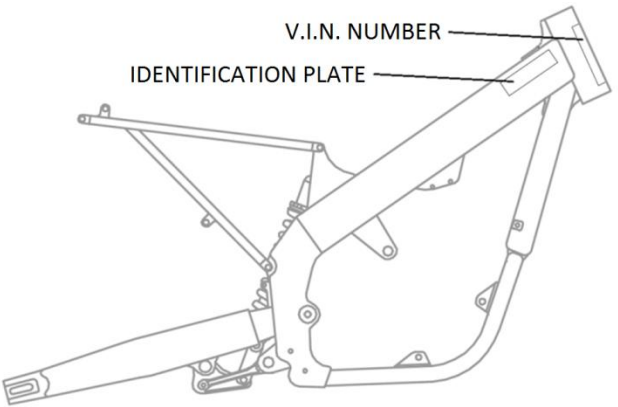
RANGE OF VEHICLES – CRF 400 RX ENDURO

RANGE OF VEHICLES – CRF 250 R ENDURO

RANGE OF VEHICLES – CRF 450 RXC SUPERMOTO

IDENTIFICATION OF VEHICLE

The identification information of the vehicle are important to register the vehicle, you can ensure to get the correct spare parts and a possible complaint of theft of the vehicle itself.



Tampering or alteration of such data may be committing a serious criminal and administrative penalties, and also results in the immediate loss of guarantee.

(A) Vehicle identification number:

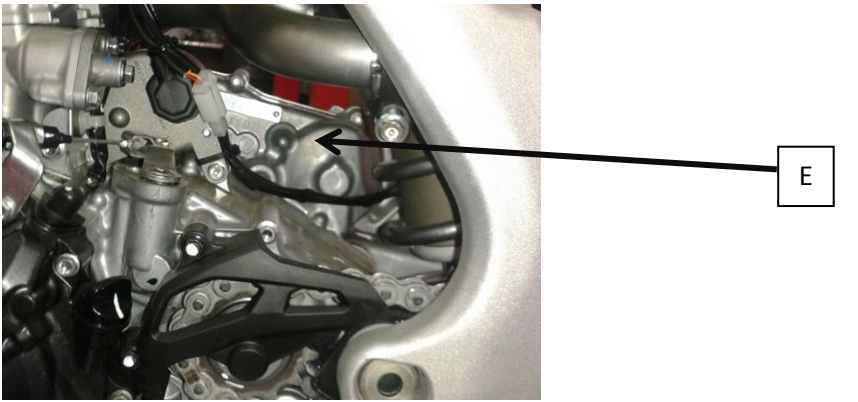
V.I.N. It is punched in the right side on the headstock of the frame

(B) Adhesive identification plate anti tampering: located on the right side of the frame

(C) Adhesive acceleration plate anti tampering: located on the left side of the frame

(D) RedMoto logo: is punched on the left side of the frame

(E) Engine Number: is punched on the engine crankcase



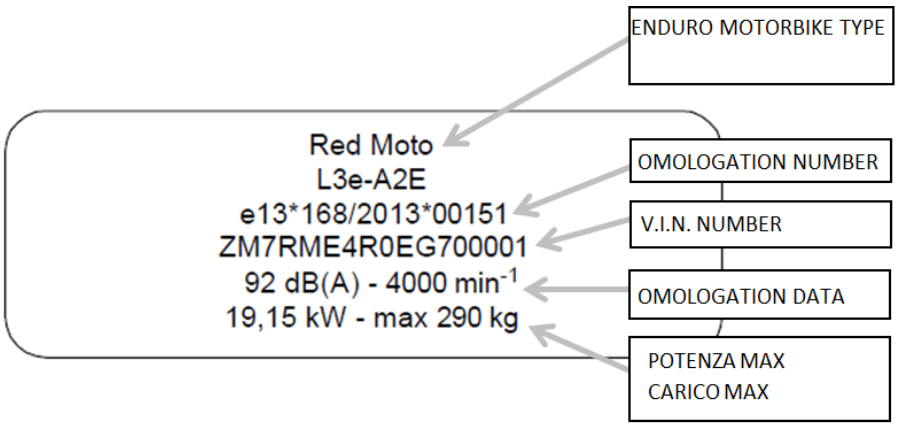
Write the information of your vehicle in the following spaces:

V.I.N. | | | | | | | | | | | | | | | | |

ENGINE NUMBER | | | | | | | |

Identification Plate

We list below the description of the summary information on the identification plate of the vehicle. We recommend photocopying this part of the manual correctly filled with VIN and engine number and keep it together with a copy of the keys lock, separate from the vehicle.



Description of the information contained in the VIN (frame number)

1	**Z**	International manufacturer number
2	**M**	
3	**7**	
4	**R**	TYPE: RMD TYPE: RME TYPE: RMH
5	**M**	
6	**E**	
7	**2**	Engine displacement : 2R=250, 3R=300, 4R=450, 4X=400
8	**R**	
9	**0**	Free character
10	**E**	Type: M=supermoto, E=enduro
11	**E**	Manufacturing year: D=2013, E=2014, F=2015…….
12	**5**	Model Year: 0=2010, 1=2011, 2=2012, 3=2013, 4=2014, 5=2015……
13	**0**	Frame progressive number
14	**0**	
15	**0**	
16	**0**	
17	**1**	

TECNICHAL SPECIFICATION – CRF 450 RX ENDURO

ENGINE AND WIRIGN SYSTEM

Type	Single cilynder, 4 stroke, liquid cooled, Unicam 4 valves
Displacement (Bore x Stroke)	449,7 cc (96.0 x 62.1 mm)
Compression Ratio	13.5 : 1
Max. Power	HOMOLOGATED 16.0 KW @ 6.500 rpm
Max. Torque	HOMOLOGATED 34.4 Nm @ 3.500 rpm
Induction System	Electronic Fuel Injection PGM-FI with EMBS (Engine Mode Select Button)
Ignition, Starter	Full Transistor with electronic advance, Electric starter

FRAME AND SUSPENSION

Type	Seven generation, Twin beam aluminum frame
Dimension (LxLxA)	2.175 x 827 x 1.274 mm
Rake (Caster Angle)	27°26’
Front Wheel trail	116 mm
Seat Height, Ground clearance	959 mm 328mm
Fuel tank capacity	7.3 l
Curb Weight	116.2kg
Front Suspension	49 mm inverted Showa spring Fork, wheel travel 305mm
Rear Suspension	Showa Mono Shock with pro link. Stroke 133 mm, wheel travel 312.5mm

TRANSMISSION, BRAKE, WHEEL

Clutch	Multi disc wet clutch
Gear Box	Five – speed, close-ratio
Final drive	Roller O-ring Chain
Front tire	90/90 – 21 Metzeler Six Days Extreme
Rear tire	140/80 – 18 Metzeler Six Days Extreme
Front brake	Single disc wave 260 mm x 3 mm with twin-piston caliper and sintered metal pads
Rear brake	Single disc wave 240 mm x 4 mm with single-piston caliper and sintered metal pads

TECNICHAL SPECIFICATION – CRF 400 RX ENDURO

ENGINE AND WIRIGN SYSTEM

Type	Single cilynder, 4 stroke, liquid cooled, Unicam 4 valves
Displacement (Bore x Stroke)	423 cc (92.0 x 62.1 mm)
Compression Ratio	13.0 : 1
Max. Power	HOMOLOGATED 14.9 KW @ 6.500 rpm
Max. Torque	HOMOLOGATED 27.2Nm @ 4.500 rpm
Induction System	Electronic Fuel Injection PGM-FI with EMBS (Engine Mode Select Button)
Ignition, Starter	Full Transistor with electronic advance, Electric starter

FRAME AND SUSPENSION

Type	Seven generation, Twin beam aluminum frame
Dimension (LxLxA)	2.175 x 827 x 1.274 mm
Rake (Caster Angle)	27°26'
Front Wheel trail	116 mm
Seat Height, Ground clearance	959 mm 328mm
Fuel tank capacity	7.3 l
Curb Weight	116.2kg
Front Suspension	49 mm inverted Showa spring Fork, wheel travel 305mm
Rear Suspension	Showa Mono Shock with pro link. Stroke 133 mm, wheel travel 312.5mm

TRANSMISSION, BRAKE, WHEEL

Clutch	Multi disc wet clutch
Gear Box	Five – speed, close-ratio
Final drive	Roller O-ring Chain
Front tire	90/90 – 21 Metzeler Six Days Extreme
Rear tire	140/80 – 18 Metzeler Six Days Extreme
Front brake	Single disc wave 260 mm x 3 mm with twin-piston caliper and sintered metal pads
Rear brake	Single disc wave 240 mm x 4 mm with single-piston caliper and sintered metal pads

TECNICHAL SPECIFICATION – CRF 250 R ENDURO

ENGINE AND WIRIGN SYSTEM

Type	Single cilynder, 4 stroke, liquid cooled, DOHC 4 valves
Displacement (Bore x Stroke)	249.4 cc (79 x 50.9 mm)
Compression Ratio	13.9 : 1
Max. Power	HOMOLOGATED 12.4 KW @ 7.250 rpm
Max. Torque	HOMOLOGATED 20.0 Nm @ 5.250 rpm
Induction System	Electronic Fuel Injection PGM-FI with EMBS (Engine Mode Select Button)
Ignition, Starter	Full Transistor with electronic advance, Electric starter

FRAME AND SUSPENSION

Type	Seven generation, Twin beam aluminum frame
Dimension (LxLxA)	2.185 x 827 x 1.274 mm
Rake (Caster Angle)	27°5’
Front Wheel trail	116 mm
Seat Height, Ground clearance	957 mm 327mm
Fuel tank capacity	6.3 l
Curb Weight	110.2kg
Front Suspension	49 mm inverted Showa spring Fork
Rear Suspension	Showa Mono Shock with pro link

TRANSMISSION, BRAKE, WHEEL

Clutch	Multi disc wet clutch
Gear Box	Five – speed, close-ratio
Final drive	Roller O-ring Chain
Front tire	90/90 – 21
Rear tire	140/80 – 18
Front brake	Single disc wave 260 mm x 3 mm with twin-piston caliper and sintered metal pads
Rear brake	Single disc wave 240 mm x 4 mm with single-piston caliper and sintered metal pads

CARATTERISTICHE TECNICHE – CRF 450 RXC SUPERMOTO

ENGINE AND WIRIGN SYSTEM

Type	Single cilynder, 4 stroke, liquid cooled, Unicam 4 valves
Displacement (Bore x Stroke)	449,7 cc (96.0 x 62.1 mm)
Compression Ratio	13.5 : 1
Max. Power	HOMOLOGATED 16.0 KW @ 6.500 giri/min
Max. Torque	HOMOLOGATED 34.4 Nm @ 3.500 giri/min
Induction System	Electronic Fuel Injection PGM-FI with EMBS (Engine Mode Select Button)
Ignition, Starter	Full Transistor with electronic advance, Electric starter

FRAME AND SUSPENSION

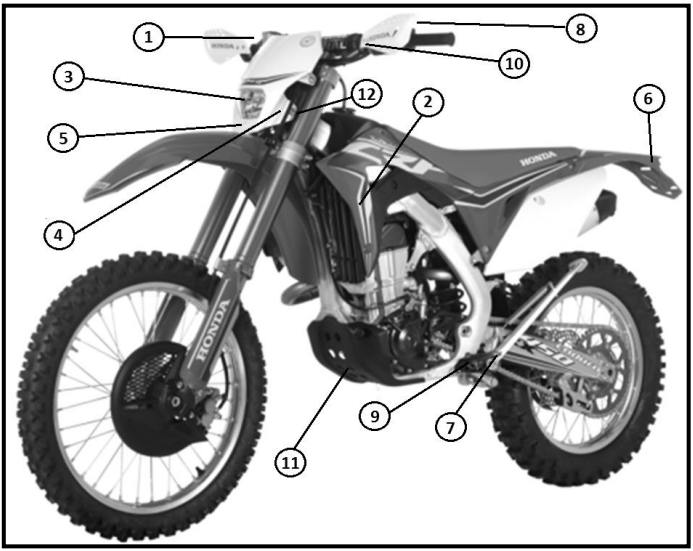
Type	Seven generation, Twin beam aluminum frame
Dimension (LxLxA)	2.128 x 821 x 1.273 mm
Rake (Caster Angle)	27°26'
Front Wheel trail	114.7 mm
Seat Height, Ground clearance	905 mm 294 mm
Fuel tank capacity	8,5 l
Curb Weight	120.7kg
Front Suspension	49 mm inverted Showa spring Fork, wheel travel 305mm
Rear Suspension	Showa Mono Shock with pro link. Stroke 133 mm, wheel travel 312.5mm

TRANSMISSION, BRAKE, WHEEL

Clutch	Multi disc wet clutch
Gear Box	Five – speed, close-ratio
Final drive	Roller O-ring Chain
Front tire	120/70 – 17
Rear tire	150/60 – 17
Front brake	Single disc wave 320 mm x 5 mm with 4 piston caliper and sintered metal pads
Rear brake	Single disc wave 240 mm x 4 mm with single-piston caliper and sintered metal pads

PRINCIPAL PARTS OF VEHICLE – CRF 450 RX ENDURO left side

1	Light switch
2	Horn
3	Main Light
4	Front left turn indicator
5	Main light adjustment screw
6	Rear left turn indicator
7	Side stand
8	Left rear mirror
9	Foot peg left side
10	Handguard
11	Engine protection plate
12	Electric wiring protection fuse

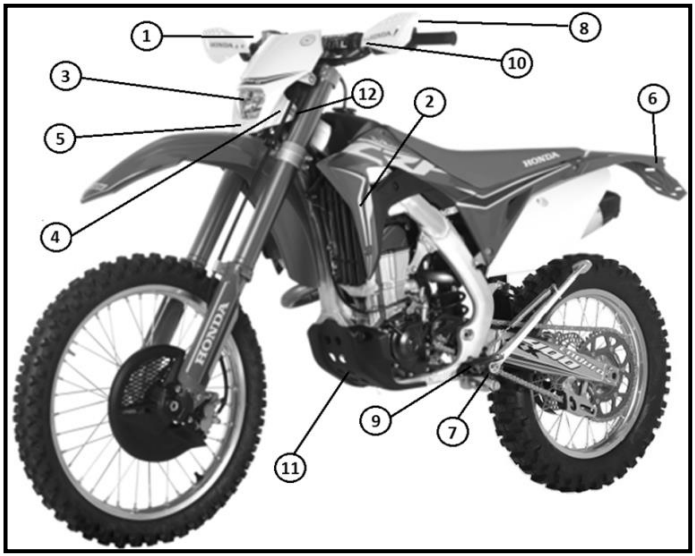


PRINCIPAL PARTS OF VEHICLE – CRF 450 RX ENDURO right side

1	Electric start button
2	Engine map selection button
3	Right mirror
4	Speedometer
5	Lock Key
6	Front right turn indicator
7	Rear right turn indicator
8	Foot peg right side
9	Rear Light
10	Rear brake Idro-stop button
11	Front brake Idro-stop button
12	Fuel tank cap
13	Exhaust pipe with catalytic device
14	Carbon exhaust muffler with db kiler

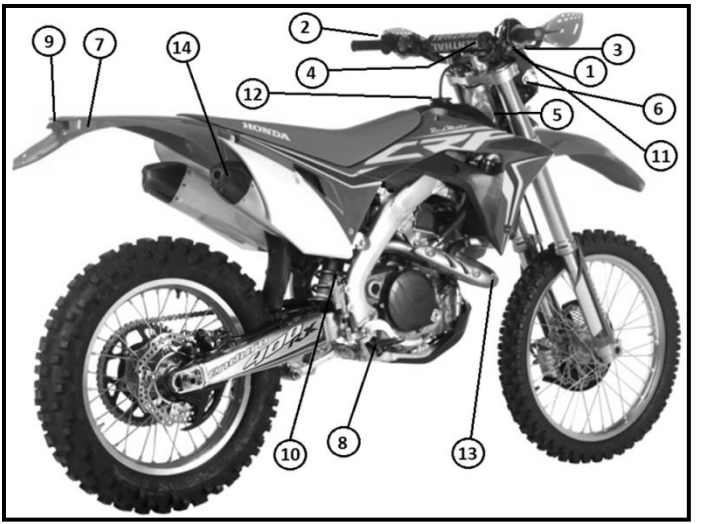
PRINCIPAL PARTS OF VEHICLE – CRF 400 RX ENDURO left side

1	Light switch
2	Horn
3	Main Light
4	Front left turn indicator
5	Main light adjustment screw
6	Rear left turn indicator
7	Side stand
8	Left rear mirror
9	Foot peg left side
10	Handguard
11	Engine protection plate
12	Electric wiring protection fuse



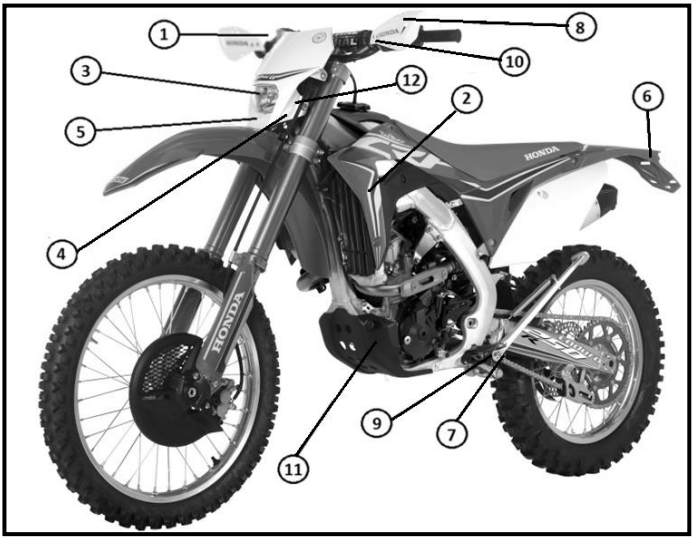
PRINCIPAL PARTS OF VEHICLE – CRF 400 RX ENDURO right side

1	Electric start button
2	Engine map selection button
3	Right mirror
4	Speedometer
5	Lock Key
6	Front right turn indicator
7	Rear right turn indicator
8	Foot peg right side
9	Rear Light
10	Rear brake Idro-stop button
11	Front brake Idro-stop button
12	Fuel tank cap
13	Exhaust pipe with catalytic device
14	Carbon exhaust muffler with db kiler



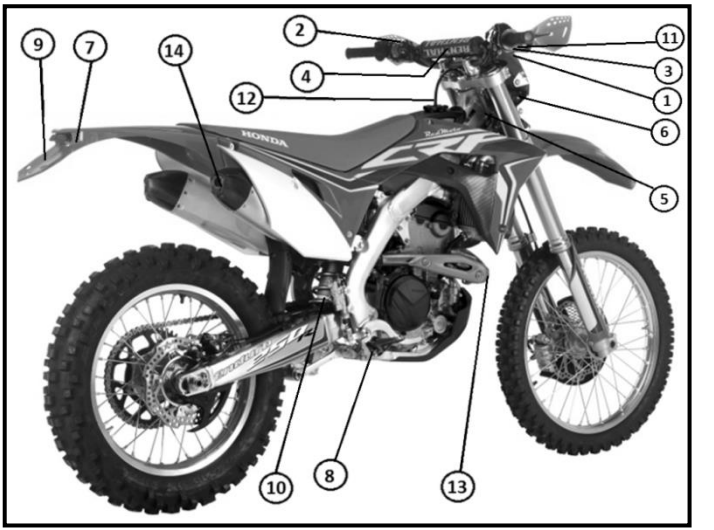
PRINCIPAL PARTS OF VEHICLE – CRF 250 R ENDURO left side

1	Light switch
2	Horn
3	Main Light
4	Front left turn indicator
5	Main light adjustment screw
6	Rear left turn indicator
7	Side stand
8	Left rear mirror
9	Foot peg left side
10	Handguard
11	Engine protection plate
12	Electric wiring protection fuse



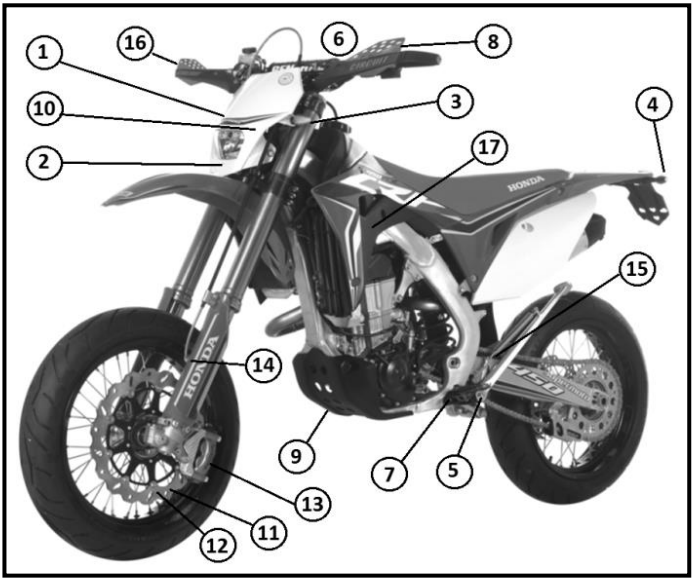
PRINCIPAL PARTS OF VEHICLE – CRF 250 R ENDURO right side

1	Electric start button
2	Engine map selection button
3	Right mirror
4	Speedometer
5	Lock Key
6	Front right turn indicator
7	Rear right turn indicator
8	Foot peg right side
9	Rear Light
10	Rear brake Idro-stop button
11	Front brake Idro-stop button
12	Fuel tank cap
13	Exhaust pipe with catalytic device
14	Carbon exhaust muffler with db kiler



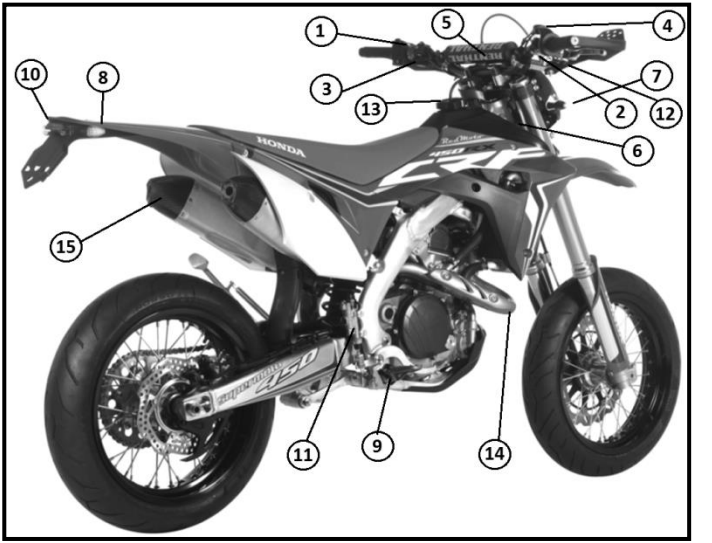
PRINCIPAL PARTS OF VEHICLE – CRF 450 RXC SUPERMOTO left side

1	Main light
2	Main light adjustment screw
3	Front left turn indicator
4	Rear left turn indicator
5	Side stand
6	Left mirror
7	Foot peg left side
8	Handle guard
9	Engine protection
10	Electric wiring fuse
11	Wave brake disc 320 mm
12	Wave brake disc hub support
13	Radial brake caliper with support
14	Brake pipe hose
15	Chain guide
16	Radial brake pump
17	Horn



PRINCIPAL PARTS OF VEHICLE – CRF 450 RXC SUPERMOTO right side

1	Light switch
2	Electric start button
3	Engine map selection button
4	Right mirror
5	Speedometer
6	Lock Key
7	Front right turn indicator
8	Rear right turn indicator
9	Foot Peg right side
10	Rear light
11	Rear brake Idro-stop button
12	Front brake Idro-stop button
13	Fuel tank cap
14	Exhaust pipe with catalytic device
15	Carbon exhaust muffler with db kiler



Engine maps button selection

For information about the mapping light, the selection mode engine mapping, consult the **HONDA USER MANUAL**

Engine stop button, MIL light

For information regarding the engine stop button and the indication provided by the MIL light, consult the HONDA USER MANUAL.

Don't push the button when ride the bike, this can damage the engine and cause a loss of vehicle control.

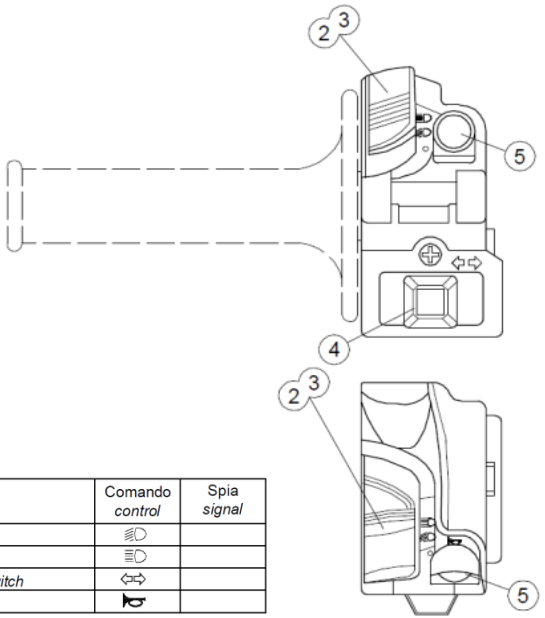
Electric Start

For information about the Electric starter button, consult the **HONDA USER MANUAL**

- The starter for this vehicle is ONLY ELECTRIC (with starter motor)
- For cold start, operate the "Air Knob"
- There is no fuel tap
- Pull the clutch to "give consent" to start

All electrical parts work only when the engine running. When the engine running , they are always on: the main lights, position lights and license plate light .

Tampering or alteration of such a facility can be run into severe penal and administrative sanctions and also involves the immediate loss of guarantee.



Rif	Dispositivo / *device*	Comando *control*	Spia *signal*
2	Devioluci anabbaglianti / *switch low beam*		
3	Devioluci abbglianti / *switch high beam*		
4	Comando indicatori di direzione / *direction indicators switch*		
5	Comando avvisatore acustico / *horn switch*		

As regards the lighting system, refer to the following:

- In Ref.2 position is on the low beam
- In Rif.1 position is on the high beam

To sound the horn press Ref.5

The switch indicators Ref.4 has 3 positions:

- Left , starts up the left turn signal
- Right , it starts up the right turn signal
- Central , off the direction indicators

After use replace the turn signal in the center position.

The use of such devices must comply with the traffic rules and specific prohibitions and terms of use required by law.

General Information

The fluid level should always be inspected before use the motorbike.

The tank level is correct if the brake fluid is located between the lines min. and max. stamped directly on the body of the tank itself.

If you find that a level not sufficient, open the cap and refill. Always check the level with only motorcycle on a flat surface. Check also the absence of irregular clearance on the pedal or the brake lever, of sponginess or abnormal elasticity in the controls. If you feel the presence of air in the ducts braking or any other event, please contact an authorized dealer RedMoto.

Periodically check that the thickness of the brake pads is not less than 1 mm. Making the total replacement of brake fluid every two years or whenever you carry out the operations of overhaul and disassembly of the hydraulic components of the system.

In case of low level of brake fluid, used only a DOT 4 brake fluid or superior quality. Brake fluid absorbs strongly moisture and oxygen from the air: if the residue in the pan has a very dark color, please contact an authorized dealer for inspection RedMoto to possible infiltration of water or air through the plant.

For the same reasons, once the package is opened the fluid, use the necessary quantity and dispose the residue.

Remember to fully replace the brake fluid every two years. The wear of the brake components is strongly influenced by driving style: do make the replacement of worn elements or revision of the braking system by qualified personnel, as an authorized dealer RedMoto.

The brake fluids and in general all fluids and lubricants for use, are harmful and can cause irritation or other disorders. Handle with care, avoid direct contact with skin or eyes, NOT SWALLOWED any fluid or lubricant!!! After contact with skin, wash thoroughly with water and contact your doctor. Never dispose of any fluid simply emptying it in the open ground or the sewage system: fluids and lubricants are highly polluting, please contact your dealer RedMoto or any other center for collection and disposal of industrial waste.

The brake system needs a break in period both in new vehicle both when making substitutions of certain components such as brake pads or brake discs.

In these phases, the braking power can be significantly lower: required then, stopping above. To avoid accidents and damage, until you feel a power optimum braking, traveling at moderate speed and braking performed mild and slightly prolonged periods with intervals of cooling system components. This procedure ensures optimum adjustment of the brake components.

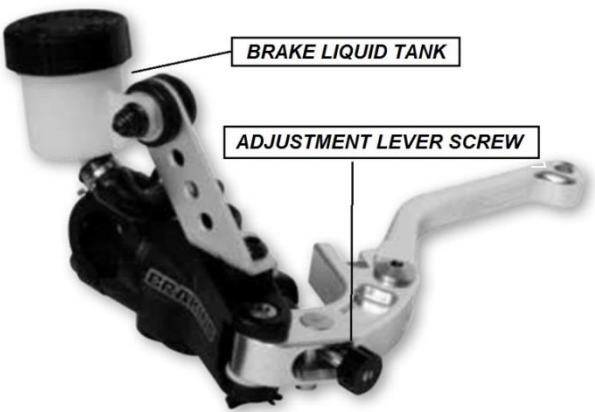
Checking the enduro brake system

The braking system fitted as standard on the enduro bike, consists of front and rear brakes fully hydraulic disc, with regard to maintenance, inspections and periodic checks to refer to what is stated in **HONDA USER MANUAL**.

Checking the supermoto brake system

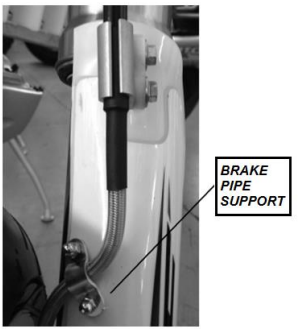
The brake system installed in series on the range supermoto, is composed of front and rear brakes fully hydraulic disc.

The front brake system is composed of a radial pump with the brake fluid tank exterior, a metal braided hose, a metal collar to lock the pipe installed on the para- fork rod, a radial caliper with four pistons / 4 pads and the relative support pliers.

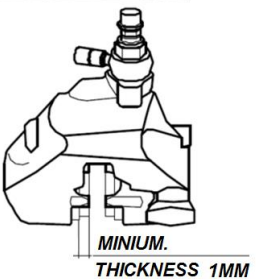


Before you get behind the wheel of the vehicle please check the oil level in the tank, adjust the brake lever according to the needs of the rider.

Make sure the brake hose is intact and not damaged, make sure that the brake hose clamp is tightened correctly and fixed the pipe in the manner shown in the figure. Check that the hose does not drag on the wheel or on the disk.

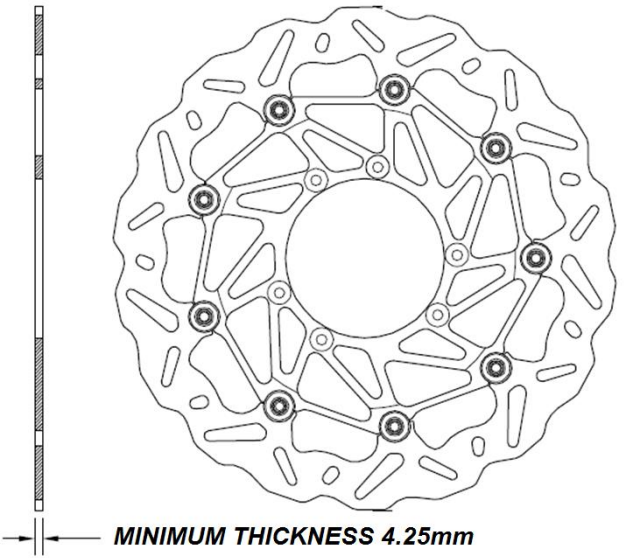


Regularly check the thickness of the brake pads, check if it is less than 1 mm, in which case it must be replaced of 2 pads.



Periodically check the thickness of the brake disk, verifying that is not less than 4.25 mm, and in that case should be immediately replaced disk.

When removing the disc, always mount the spacer interposed between disc and hub , tighten the 6 screws and nuts after applying liquid thread locker.



The radial 4-piston brake caliper is fixed to the support with 2 screws M10, the replacement of the support or the caliper, tighten the screws after applying liquid thread locker.

TORQUE TIGHTENING

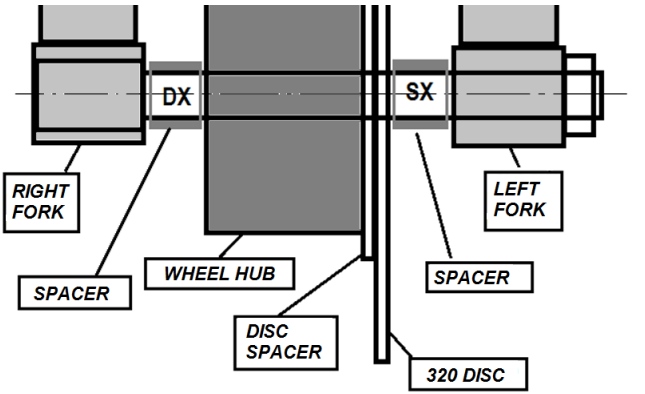
SUPPORT CALIPER SCREW M8

- 25 Nm

CALIPER SCREW

- 35 Nm

When removing the front wheel, pay special attention to the 2 spacers left and right for the pin, both identified with laser marking.



Regarding the standard maintenance, inspections and periodic checks for the rear brake system supermoto refer to what is stated in **HONDA USER MANUAL**.

The key presents more than 1000 different combinations. On the key number it is indicated that univocally distinguishes the corresponding block.
Two keys are supplied (one spare).
Never operate the steering lock when the bike is in motion.

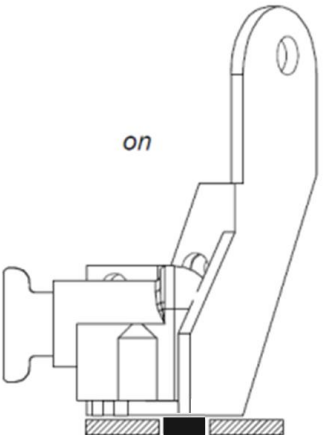
To lock the steering

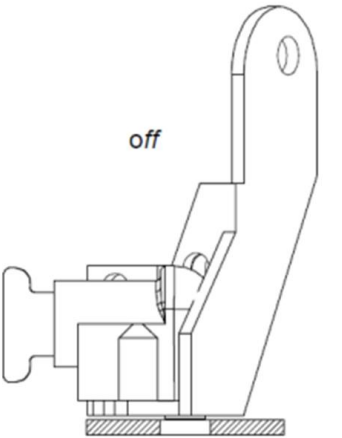
1. Turn the handlebar to the left.
2. Insert the key into the lock
3. Turn the key anticlockwise
4. Remove the key

To un-lock the steering

1. Insert the key into the lock
2. Turn the key clockwise
3. Remove the key

Lock steering





CONTROL DEVICES – CATALYTIC SYSTEM

The exhaust system is equipped with catalytic platinum and rhodium catalyzed at inside of the exhaust manifold which converts hydrocarbons and nitrogen monoxide into water vapor and carbon dioxide.

To generate the chemical reactions necessary to the process, the catalyst works at high temperatures which are maintained high even after stopping the engine.

To protect the catalytic exhaust system is good to follow certain rules:

- Only use unleaded petrol
- Have your vehicle checked when high exhaust smoke, carburetion not perfect, flashbacks or irregular operation
- Do not replace / tamper the silencers

The vehicle is equipped with a secondary air system for the activation of the catalyst reaction, via the input of ambient air rich in oxygen in the exhaust manifold ("secondary air"), at that point takes place a post-oxidation ("afterburning") of harmful substances.

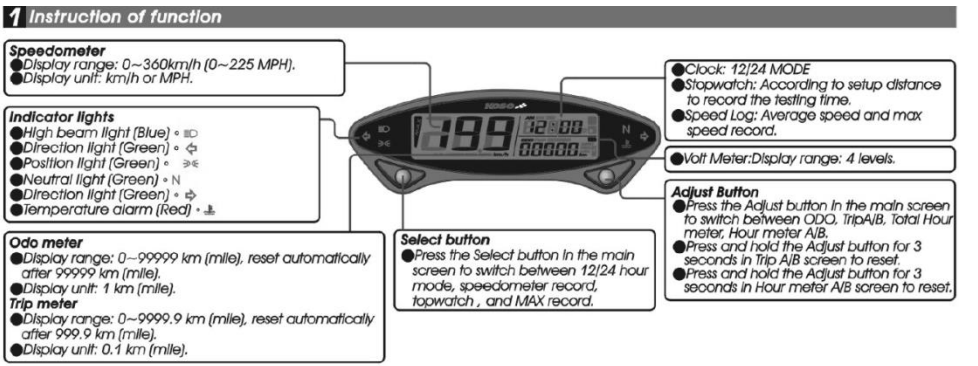
Tampering or alteration of such a facility can be run into severe penal and administrative sanctions and also involves the immediate loss of guarantee

CONTROL DEVICES – NOISE REDUCTION

The silencers of CRF motorcycles are equipped with DB - killer inserted inside the muffler out-pipe. This device consists of a final pipe of the silencer that by occluding the exhaust pipe, drastically reduces the noise emissions.

The removal of the DB-killer can be incurring several penal and administrative sanctions and also involves the immediate loss of guarantee.

The speedometer unit includes a speedometer , odometer , trip odometer, and some indicators of service .



●Adjust button function instruction

●In main screen, press the **Adjust button** once to switch the function from odometer to trip .

●In main screen, you could hold pressing the **Adjust button** for 3 seconds to change the speed unit.

●Press the **Adjust button** to switch from trip A to trip B.

●Hold pressing the Adjust button for 3 seconds to reset the trip A.

●Press the **Adjust button** to switch from trip B to total hour meter.

●Hold pressing the **Adjust button** for 3 seconds to reset the trip B.

- Press the **Adjust button** to switch from total hour meter to hour meter A.

- Press the **Adjust button** to switch from hour meter A to hour meter B.
- Press and hold the **Adjust button** for 3 seconds to reset the hour meter A.

- Press the Adjust Button to switch from Hour Meter B back to the main screen
- Press and hold the Adjust Button for 3 seconds to reset the Hour Meter B

- The main screen.

●Select button function instruction

●Press the Select button during main screen to switch from Clock to Stopwatch.
●Press and hold the Select Button for 3 seconds to change between 12/24hour mode.

NOTE If 24hour mode is chosen, then the AM/PM symbol will not be displayed.

●Press the Select button to switch from Stopwatch to Speed Record.
●Press and hold the Select Button for 1 seconds to reset the Stopwatch.

- *Press the Select button to switch from Speed Record back to main screen.*
- *Press and hold the Select Button for 3 seconds to reset the Speed Record.*

NOTE *If Engine Oil Light goes up, reset the Engine Oil Light in this screen to recalculate the mileage*

NOTE *Average speed and the Max speed display in the 3 seconds rotation.*

- *The main screen.*

3 To Enter the Setting Mode

●Adjust+SelectX3 function instruction

●In main screen, press down the ***Adjust+SelectX3*** to enter the tire circumference and sensing point setting (for changing different size tire.)

●The tire circumference and sensor point setting
●Press the ***Adjust Button*** to enter the tire circumference setting

●The tire circumference and sensing point setting

●EX. The tire circumference is 1,300 mm.

●Press the **Adjust Button** to move to the digit you want to set.

NOTE

The tire circumference setting range: 300~2,500 mm, and the digit you set is from left to right in order.

P.S.

You could define the valve as the starting point and the terminal point to measure the wheel circumference with a measuring tape.

●EX. The tire circumference setting is changed from 1,000 mm to 1,300 mm.

●Press the **Select Button** to change the setting.

●Press the **Adjust Button** for three times to enter the sensing point setting.

●*Sensing point setting*

●***EX. The sensing point you want to set is 6.***

●*Press the **Select Button** to move to the digit you want to set.*

NOTE

The sensing point setting range: 1~6 points. You could change the setting from left to right.

●*EX. the sensing point setting is changed from 1 to 6.*

●*Press **Adjust Button** to go back to tire circumferences value & sensing point setting screen.*

●*From a 0 switch to a 1 screen.*

●*Press the **Adjust Button** to enter the the clock (Hour) setting*

●*Press the **Selectt Button** to enter the the clock (Hour) setting.*

●*The clock (Hour) setting*

●***EX: You want to set the hour at 14.***
●*Press the **Select Button** to choose the hour you want to set.*

NOTE *Setting range: 0~24 H.*

NOTE *The sequent of cursor movement: Hour>Ten-Digit of Minute>Single Digit of Minute*

●*EX. Now the setting is changed from 0:00 to 14:00.*
●*Press the **Adjust Button** to enter the minute setting.*

●***The clock (minute) setting***

●***EX. To change the setting to 14:05.***
●*Press the **Select Button** to choose the minute you want to set.*

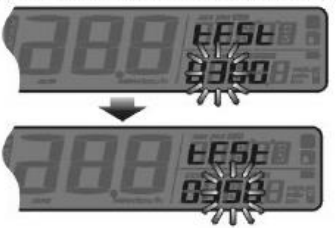
NOTE *Setting range: 0~59 minutes.*

●***EX. Now the minute is changed from** 14:00 to 14:05.*
●*Press **Adjust Button** to get back to Clock setting screen.*

●*Switch from **d 1** to **d 2** .*
●*Press **Select Button** to switch to Stopwatch distance setup entering screen.*

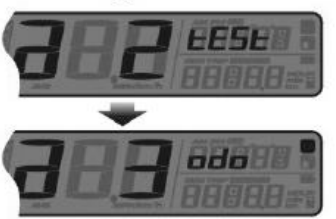
●*Press **Adjust Button** to enter the distance setup for Stopwatch .*

●Distance setup for Stopwatch



●Figure: Distance for Stopwatch setting value from 300 to 350.
●Press **Adjust Button** to go back to the Stopwatch setting screen.
●Ex: To set the distance to 350 for the Stopwatch
●Press the **Select Button** to change the setting.

NOTE The range of distance for Stopwatch is from 100m to 2000m.



●Switch from A 2 to A 3.
●Press **Select Button** to switch to Engine Oil Light Mileage setting screen.

●Press **Adjust Button** to enter the Engine Oil Light Mileage setting.

●Engine Oil Light Mileage Setting

●*Figure: Engine Oil Light Mileage setting value from 300 to 500.*
●*Press* ***Adjust Button*** *to go back to the Engine Oil Light Mileage Setting screen*

NOTE *The range of Engine Oil Light Mileage is from 300 km to 5000 km.*

●*Ex: To set the mileage to 500 for the Engine Oil Light.*
●*Press the* ***Select Button*** *to change the setting.*

●*From a3 switch to main screen.*
●*In Stopwatch screen, press* ***Adjust Button*** *to go back to main screen*
●*Hold pressing the* ***Adjust Button*** *for 3 seconds to go back to main screen.*

●*The main screen.*

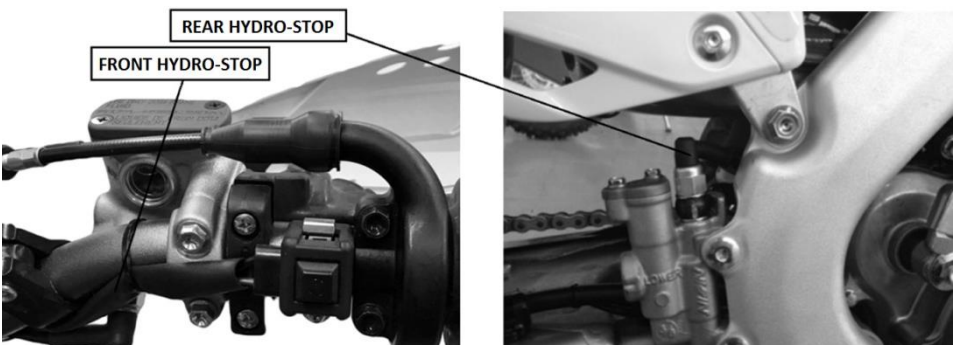
Regularly check the pressure and condition of the tires. The tire pressure should be adjusted according to the characteristics of the ground, riding style and load conditions. Replace the tires when the depth of the pneumatic thread out to be equal to 1.6 mm even in a single point of the tread. Always check that the tires are intact, with no injuries or objects stuck on the sides and on the tread.
Replace tires only installing components with the same technical and regularly approved for road use. RedMoto recommended to always use the same tires fitted as standard, check the RedMoto service and sales network for replacement.

STANDARD EQUIPMENT TYRE PRESSURE:

MODEL	FRONT	Pressure kPa (BAR)	REAR	Pressure kPa (BAR)
CRF 250 400 450 ENDURO	90/90-21	140 (1.4 BAR)	140/80-18	160 (1.6 BAR)
CRF 450 SUPERMOTO	120/70-17	180 (1.8 BAR)	150/60-17	200 (2.0 BAR)

CHECK FUNCTIONALITY – HYDRAULIC SWITCH STOP

The vehicle is equipped with the brake light switch, is activated by the brake pedal to the rear brake cylinder and by the brake lever to the front brake pump.
The switch works properly when the brake light comes on just before braking
The operation of the stop is critical to the safety of the vehicle, in case of failure to review the components to an authorized dealer RedMoto.



CHECK FUNCTIONALITY – SIDE STAND

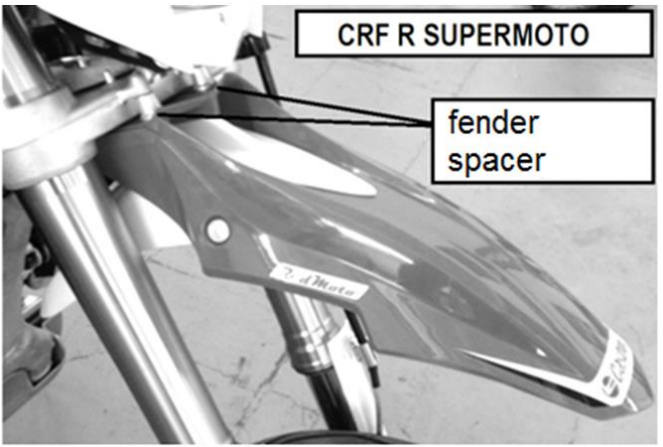
Before using the vehicle, always check the side stand function and lubricate the pivot pin between the stand clutch and its support. The stand must be raised freely when releasing and lowering it easily, if it is not possible to do these operations, please have it checked by a RedMoto dealer.

CHECK FUNCTIONALITY – SUPERMOTO FRONT FENDER

Motorcycles supermoto model are equipped with dedicated front fender.

The edge changes depending on the model year of motorcycle.

When removing the fender to the SUPERMOTO sure to refit the fender spacers in the specific location.



CHECK FUNCTIONALITY – ENDURO HAND GUARD

The vehicle is equipped with protective guards, check the tightness of the hand guard and properly adjust the height of the same based on the location of the brake and clutch levers. The Enduro handguards are installed on a plastic support.

CHECK FUNCTIONALITY – SUPERMOTARD HAND GUARD

The vehicle is equipped with protective guards, check the tightness of the hand guard and properly adjust the height of the same based on the location of the brake and clutch levers. The Supermoto handguards are installed on aluminum support.

CHECK FUNCTIONALITY – ENGINE PROTECTION

The bike is equipped with a protective skid plate. For removal, place the vehicle on the stand and make sure the engine is cooled to decrease temperature to avoid possible burns, refer to the **HONDA USER MANUAL** for removal.

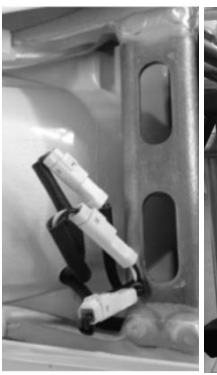
CHECK FUNCTIONALITY – SUPERMOTARD CHAIN GUIDE

The supermoto model is equipped with anti- friction chain guide, fixed at the wing arm by specific metal plate and 2 screws, the screws are tightened with a torque of 10 Nm. If the consume of chain guide becomes important, we recommend the replacement of one of the authorized dealers RedMoto .

CHECK FUNCTIONALITY – PLATE SUPPORT

The tail is the number plate includes direction indicators, day light and stop light. In case of malfunction of one of these components, you should do the following:

1. Verify the integrity of electrical connectors under seat
2. Check electrical fuse under main front light
3. Check integrity of connectors plants under main front light



To replace the bulb, tail and brake light, remove the tail number plate that is attached to the rear fender with 3 screws.

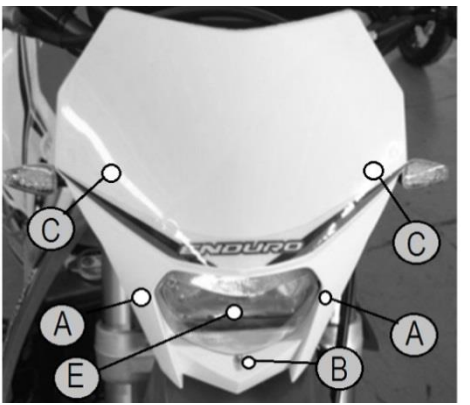
Being an LED headlamp is necessary to replace the entire light of the tail holder.

CHECK FUNCTIONALITY – MAIN LIGHT

The vehicle is provided with a headlight holder and LED projector that include position light, high and low beam (Ref . E)

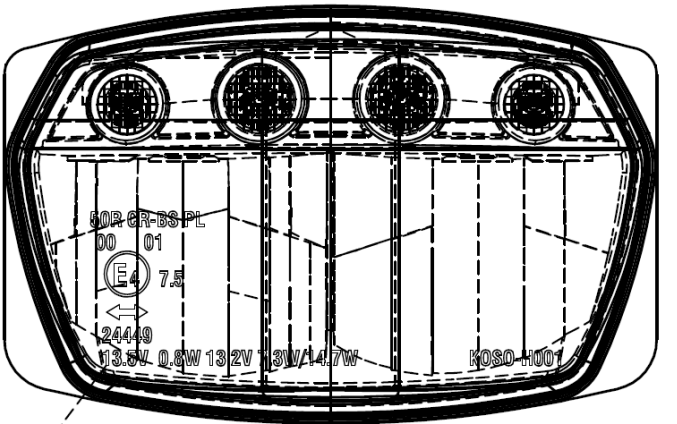
For maintenance, remove the following components in the order listed :

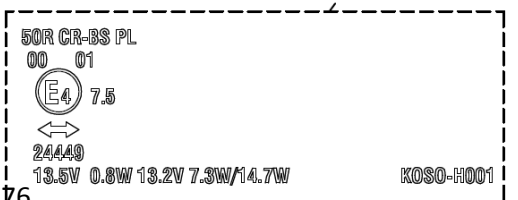
1. Connectors arrows left and right front, under cover (Ref . D)
2. Fixing nut end of the indicators (Ref . C)
3. Lower screw fixing holder lighthouse (ref . A)



In case of failure, to replace the projector assembled in the headlight is necessary to replace the complete led prector.

CHECK FUNCTIONALITY – MAIN LIGHT

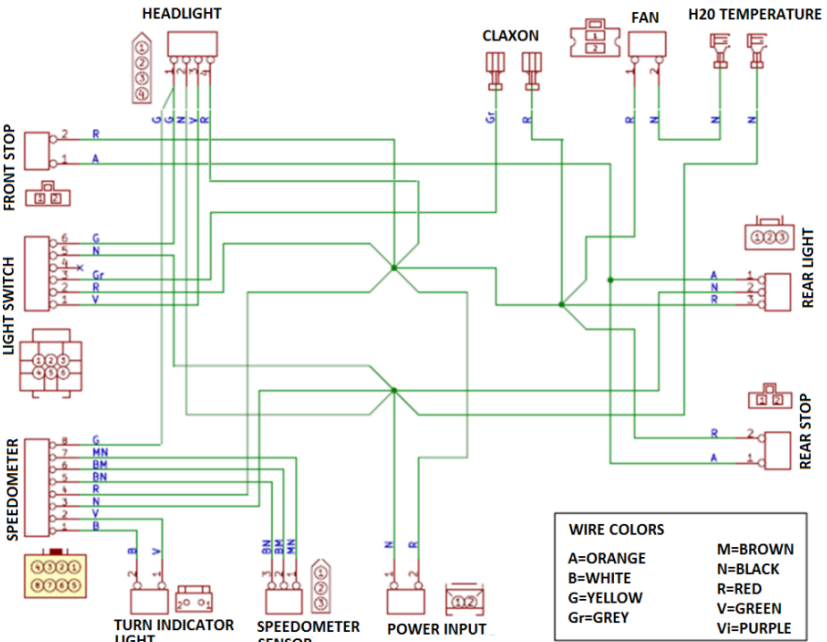




The electrical system consists of the following components:

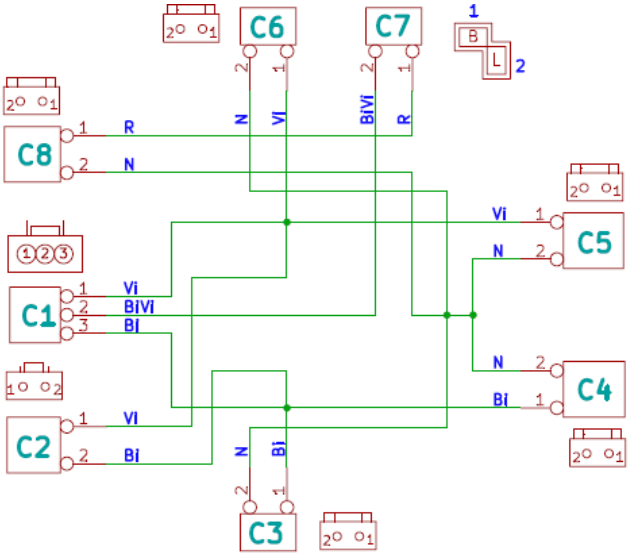
CODE	DESCRIPTION	Q.TY'
RM.08.H01A.0	CENTRAL ELECTRIC WIRING	1
RM.08.H02A.0	RETARDER ELECTRIC WIRING	1
RM.08.E03A.0	TURN ELECTRIC WIRING	1
RM.08.D06A.0	LIGHT SWITCH	2
RM.08.D07A.0	HYDRAULIC STOP BUTTON 10X1.25	1
RM.06.G01A.0	HORN	1
RM.06.D02A.0	SPEEDOMETER SLIM	1
RM.02.H01A.0	SPEEDOMETER SENSOR	1
RM.04.E01A.0	MAIN LIGHT	1
RM.10.D01A.0	PLATE SUPPORT	1
RM.10.D02A.0	COUPLE OF FRONT TURN INDICATOR	1
RM.10.F03A.0	COUPLE OF REAR TURN INDICATOR	1

CHECK FUNCTIONALITY – CENTRAL WIRING RM.08.H01A.0



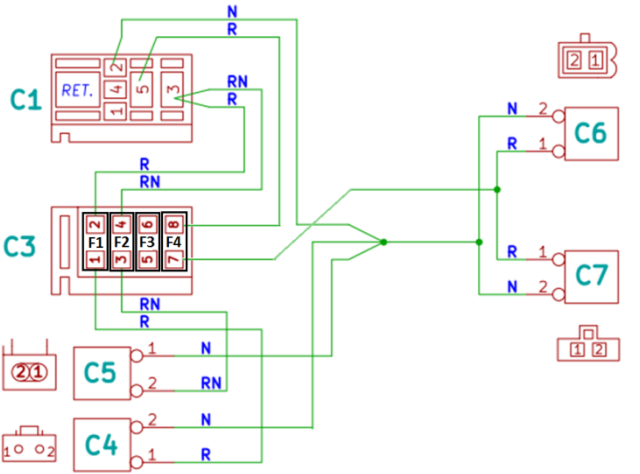
CHECK FUNCTIONALITY – TURN WIRING RM.08.E03A.0

CONNECTORS	
C1	LIGHT SWITCH
C2	DISPLAY LIGHT
C3	FRONT LEFT TURN LIGHT
C4	REAR LEFT TURN LIGHT
C5	REAR RIGHT TURN LIGHT
C6	FRONT RIGHT TURN LIGHT
C7	FLASH
C8	POWER
WIRING COLORS	
Bi	White
N	Black
R	Red
Vi	Purple



CHECK FUNCTIONALITY – RETARDER WIRING RM.08.H02A.0

CONNECTOR	
C1	RELE' AND RETARDER
C3	FUSE BOX
C4	POWER TURN WIRING
C5	POWER CENTRAL WIRING
C6	HONDA ALTERNATOR
C7	WIRING POWER
FUSE COLORS	
F1	TURN INDICATOR FUSE 5A
F2	CENTRAL WIRING FUSE 7.5A
F3	SPARE FUSE 15 A
F4	POWER FUSE 15 A
WIRING COLOR	
N	Black
R	Red
Vi	Violet



CHECK FUNCTIONALITY – WIRING POWER

The electrical system is powered directly to the alternator, the fastons connecting the feeding plane are connected directly to the Honda electrical system.

CHECK FUNCTIONALITY – MIRRORS

Before you get behind the wheel of the vehicle, adjust your mirrors correctly. For proper adjustment, climb astride the vehicle, and carefully handling the mirror adjusts properly, the two joints help change angle and height of the same.

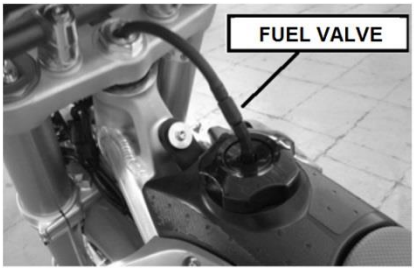
CHECK FUNCTIONALITY – SPEEDOMETER SENSOR

The vehicle is equipped with speedometer sensor placed near the rear wheel, check that the sensor is centered with the bolt securing disc. In case of failure to read loosen the nut and change the relative position of the sensor.

CHECK FUNCTIONALITY – FUEL TANK

To get fuel in the vehicle, unscrew the fuel cap counterclockwise, make sure the tank is filled with sufficient fuel. Fill the tank to the bottom of the filler tube as shown in Figure.
The filler cap is equipped with specific valve.

Do not overfill the fuel tank, otherwise it may overflow when the fuel warms and expands.
Avoid spilling fuel on the hot engine.
For specifications on the type fuel tank capacity follows the next information's.



CHECK FUNCTIONALITY – FUEL TANK CRF 450 RXC SUPERMOTO

Plastic fuel tank, capacity 8.5 L

Titanium fuel tank, capacity 6.3 L

Plastic fuel tank, capacity 7.3 L

PERIODIC MAINTENANCE – PREDELIVERY AND MAINTENANCE ACTIVATION

The dealer at the time of sale of the vehicle is required to perform a number of operations and inspections for the safety of the vehicle and make it suitable for use on public roads. It is therefore necessary that the dealer must perform the following tests:

- ✓ Check wheel shaft
- ✓ Check brake systems
- ✓ Check fluid level cooling system
- ✓ Check engine oil and transmission oil levels
- ✓ Installing batteries and verify operation of electrical system
- ✓ Check tire pressure
- ✓ Check for correct operation commands
- ✓ Check tightening handlebars and controls
- ✓ Check chain tension
- ✓ Adjustment mirrors devices
- ✓ Try switching on and off
- ✓ Checking the gear and clutch

The owner is responsible for the condition of the vehicle. The controls of functionality are necessary to ensure a correct and safe operation of the vehicle.
Failure to perform the checks required can cause serious damage to the vehicle and injury to the rider; therefore it is very important , as well as a visual inspection always check the following before each use.

Operations to be performed by the rider:

	CHECK
Fuel	• Check fuel level • Check integrity tubes and fuel pipes
Engine Oil	• Check engine oil level and top up with the recommended oil • Check the vehicle for leaks oil
Anterior Brake	• Check operation • Check integrity plumbing pipes • Check the oil level in the tank • Perform bleeding if there is a softness in the system • Check any games deli controls (lever ant . , Foot post .)

	CHECK
Clutch	• Check operation • Lubricate cable if necessary • Check the clutch lever
Throttle	• Make sure that the command is free • Check the running clearance
Transmission Chain	• Check chain tension and adjust if necessary • Check the condition and lubricate or replace
Wheel and Tire	• Check the state of wear by measuring tread depth • Check inflation pressure
Side stand	• Make sure that operation is smooth • Lubricate the pivot point if necessary
Frame bolts	• Make sure all nuts , bolts are properly tightened • Tighten if necessary
Speedometer and switch	• Check operation • Replace if necessary

If any one of those parties is not working correctly, perform the repair to the dealer RedMoto.

PERIODIC MAINTENANCE – TRIAL STAGE PERIOD

The break-in period of the engine is absolutely essential for a smooth operation of the same throughout his life. And therefore necessary to carefully follow these simple instructions . For the first two tanks of gasoline, never exceed 1/4 throttle opening and journeys made only at a moderate speed, flat, without straining the engine. Never open the throttle suddenly, is departing is recovering. And until the first service, do not open the throttle suddenly, not made -speed fully loaded with the engine strongly stress and avoid exceed 3/4 throttle opening. Do not transport passengers throughout the break-in period. During the first weeks of use of the vehicle, can occur high consumption of coolant and / or engine oil. Check with high frequency all fluid levels . Always use oil with the following characteristics:

API Classification (only 4 stroke oil)	SG o superior
Viscosità	SAE 10W-30
JASO T903 standard	MA
Oil type	No additives based on graphite and molybdenum
Oil advised	“POWER ONE RACING” Castrol

PERIODIC MAINTENANCE – CHECKING AFTER RUNNING (after 500 Km.)

Operations to be performed by the dealer

- ✓ Adjustment throttle
- ✓ Clean air filter and filter container inspection
- ✓ Adjust clutch lever
- ✓ Check tightening bolts fork and levers, steer tube
- ✓ Check coolant level
- ✓ Replace engine oil and oil filter
- ✓ Replace Gear Oil
- ✓ Control and tightening battery terminals
- ✓ Adjust minimum rpm of the engine
- ✓ Check tire condition and tire pressure
- ✓ Check chain tension and lubrication
- ✓ Adjust centering wheels and spoke tension
- ✓ Checking chain tension and lubrication chain
- ✓ Control and electrical height adjustment headlight

PERIODIC MAINTENANCE – OFF ROAD USE (each 200 Km)

Operations to be performed by the dealer

- ✓ Clean air filter
- ✓ Check clutch lever
- ✓ Check lighting system
- ✓ Check coolant level
- ✓ Ensure been radiator and cooling system
- ✓ Check the engine oil level
- ✓ Check gearbox oil level
- ✓ Check the drive chain tension and lubrication
- ✓ Control and electrical height adjustment headlight
- ✓ Check tightening bolts and plastic chassis

NOTE : It is recommended replacement piston complete every 30 hours. This Period may vary according to driving conditions of riders

PERIODIC MAINTENANCE – 1° CHECKING (after 1500 Km. o 3m)

Operations to be performed by the dealer page 1 / 2:

- ✓ Replace spark plug
- ✓ Adjust throttle
- ✓ Clean air filter and filter container inspection
- ✓ Adjust clutch lever
- ✓ Check forks games and levers, boat and steering slack
- ✓ Check coolant level
- ✓ Replace engine oil and oil filter
- ✓ Replace Gear Oil
- ✓ Control and tightening battery terminals (CRF X)
- ✓ Adjust minimum rpm of the engine
- ✓ Check rims and wheels
- ✓ Check tire condition and tire pressure
- ✓ Check chain tension and lubrication distribution

Adjust centering wheels and spoke tension

Operations to be performed by the dealer page 2 / 2:

- ✓ Check brake pad wear, brake fluid level checks
- ✓ Check valve clearance
- ✓ Check clutch wear
- ✓ Check soundproofing material silencers
- ✓ Clean exhaust
- ✓ Control and electrical height adjustment headlight
- ✓ Check tightening bolts cycling
- ✓ Checking chain tension and lubrication chain

NOTE : It is recommended replacement piston complete every 30 hours. This Period may vary according to driving conditions of riders

PERIODIC MAINTENANCE – 2° CHECKING (after 3000 Km. o 6m)

Operations to be performed by the dealer page 1 / 2:

- ✓ Replace spark plug
- ✓ Adjustment throttle
- ✓ Clean injection system (CRF R) or carburetor (CRF X)
- ✓ Change air filter and filter container inspection
- ✓ Adjust clutch play
- ✓ Check forks games and levers , boat and steering slack
- ✓ Check coolant level
- ✓ Replace engine oil and oil filter
- ✓ Replace Gear Oil
- ✓ Adjust idling engine
- ✓ Check rims and wheels
- ✓ Clean wheel bearings and oil seals replacement
- ✓ Check tire condition and tire pressure
- ✓ Adjust chain tension and lubrication distribution
- ✓ Adjust centering wheels and spoke tension

PERIODIC MAINTENANCE – 2° CHECKING (after 3000 Km. o 6m)

Operations to be performed by the dealer page 2 / 2:

- ✓ Check brake pad wear, brake fluid level checks
- ✓ Check Valve Clearance
- ✓ Check clutch wear and change discs Worn
- ✓ Replace soundproofing material silencers
- ✓ Clean exhaust
- ✓ Control and electrical height adjustment headlight
- ✓ Check tightening bolts cycling
- ✓ Checking chain tension and lubrication chain
- ✓ Seal control valves
- ✓ Replace piston and piston rings
- ✓ Check clearance of the connecting rod

NOTE : It is recommended replacement piston complete every 30 hours. This Period may vary according to driving conditions of riders

TROUSSE TOOL KIT

The tool kit is supplied as standard with all vehicles enduro and supermoto.

The service information included in this manual and the tools of the kit are intended to assist in the execution of preventive maintenance and minor repairs. E 'can, however, that to successfully perform certain maintenance work, it is necessary, additional tools such as a torque wrench. The standard equipment includes:

- pliers
- wrench by 22, 32
- socket wrench 10 and from 8
- wrench 10, 12, 14
- Phillips screwdriver / cutting
- Allen wrench 5, 6
- clamp plastic off-fuse
- Key candle
- Key rays

If you did not have the tools or do not have the experience necessary for a particular job, please contact RedMoto dealer.

FINAL NOTE

The vehicle was designed, built and calibrated for use in moderate climates and moderate humidity. Ignition devices have been optimized and calibrated for use in the following conditions: -5 ° to 26 ° C and 0 to 900 meters above sea level Outside of these operating conditions, different settings may be necessary, not included in the normal periodical maintenance plan. If you need any modification, contact an authorized dealer RedMoto.

Do not use any motorized vehicle devoid of some of the components of the extraction system: the intake part of the engine and the air filter can not be a source of failure and malfunction. For use on dusty roads made frequent cleaning of air intake system and components of the air filter. As a result of particularly heavy, obvious evidence of tampering or negligence in maintenance, authorized dealers RedMoto reserve the right to cancel the guarantee to all mechanical.

FINAL NOTE

The fluids and lubricants present or be used on this motorcycle are harmful, can be highly flammable and can cause irritation or other disorders.
Take ALWAYS with caution, avoid direct contact with skin or eyes, NOT SWALLOWED any fluid or lubricant!!! After contact with skin, wash thoroughly with water and contact your doctor.

Never dispose of any fluid simply emptying it in the open ground or the sewage system: fluids, fuels and lubricants are highly polluting. Store in a sealed container or exhausted any residual cleaning motorcycle containing traces of lubricants, fuel or other fluids; Contact your authorized dealer RedMoto or other collection points for safe disposal. The product gas from the exhaust contains TOXIC SUBSTANCES, gasoline is highly flammable, explosive and highly volatile. Always use caution when handling gasoline for refueling, which must be made with the engine off, open and airy open spaces. Let always free at least the last stretch of the neck of the tank. Do not start the vehicle engine if the body is sprinkled with abundant patches of gasoline.

Do not smoke or handle open fire while refueling.
Never start the engine or let it never turned into an enclosed gas produced by the discharge is harmful, can create disturbances, promote loss of consciousness, poisoning and can lead to death. Always close the fuel valve when the vehicle is parked. NOT ever used gasoline or other solvents to clean the motorcycle: use only specific detergents in the appropriate dilutions.

Improper installation of accessories and modifications of this motorcycle can cause changes in maneuverability and invite accidents. Any added accessories compared to the preparation of the series, even if purchased or installed by the Redmoto service network may involve changes to the vehicle that are not compatible with the specifications of the registration certificate. In any case not before changing your vehicle with non-original components or improper. Installed in any case only the accessories and components Redmoto.

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