

**OWNER'S MANUAL** 



#### **PREFACE**

Thank you for selecting a Hero MotoCorp **HF 100.** We wish you many miles of continued riding pleasure in the years ahead.

We, at Hero MotoCorp, are committed to demonstrate excellence in our environment performance on a continual basis, as an intrinsic element of our corporate philosophy. To achieve this we commit ourselves to continue product innovations to improve environment compatibility, comply with all applicable legislation including environment legislation and strengthen the green supply chain.

Your vehicle is conforming to latest BS6 STAGE-II (OBD STAGE II-A) regulation for emission, safety & noise levels. We are also using non asbestos brake shoes/pads and engine gaskets which are environment friendly in nature.

This vehicle is fitted with a lighting feature known as "Automatic Headlamp ON". The feature is mandated for all 2 Wheelers by Ministry of Road Transport & Highways (Government of India) vide notification GSR 188 (E) dated 22nd February 2016. This feature helps in conspicuity for improving rider safety. The headlamp of this vehicle will always be lit ON when the engine gets ON.

This booklet is your guide to the basic operation and maintenance of your new Hero MotoCorp **HF 100**. Please take time to read it carefully. As with any fine machine, proper care and maintenance are essential for trouble–free operation and optimum performance.

Your Authorised Hero MotoCorp dealer will be glad to provide further information or assistance and is equipped to handle your future service needs.

Let us make this world a safer, healthier and more environment friendly place.

# NOTE

ALL INFORMATION, ILLUSTRATION, PHOTOGRAPH, DIRECTIONS, SPECIFICATIONS AND OTHER CONTENTS COVERED IN THIS OWNER'S MANUAL ARE BASED ON THE LATEST PRODUCT INFORMATION AVAILABLE AT THE TIME OF ITS PUBLISHING APPROVAL, AND THE ACCURACY OR CORRECTNESS OF THE SAME IS NOT UNDERTAKEN OR GUARANTEED. Hero MotoCorp Ltd Reserves the Right to Make Changes in Its Contents at any time without notice and/or incurring any Obligation, whatsoever. No one is allowed to reproduce any Part of this publication without obtaining prior written

ACCESSORIES SHOWN MAY NOT BE THE PART OF STANDARD FITMENT. IT IS OUR ENDEAVOUR TO CONSTANTLY IMPROVE OUR PRODUCTS. THIS COULD LEAD TO CHANGE IN PRODUCT SPECIFICATIONS WITHOUT NOTICE. Hero MotoCorp Ltd 'HF 100' COMPLIES WITH THE LATEST EMISSION NORMS.

**PERMISSION FROM** Hero MotoCorp Ltd.

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#### VEHICLE IDENTIFICATION



Vehicle Identification Number (VIN)

steering head tube.



Engine No.

Location: Stamped on the right side of the Location: Stamped on the lower side of the left crankcase.

VIN: MBLHAC11#######

MBL	HAC10	#	#	#	#	#####
Manufacturer	Vehicle	Check	Model Year	Plant	Month of	Production
code	Description	Digit		Code	Manufacturing	Serial Number

Engine No.: HA11EB######

HA11EB	11EB # #		#	#####
Engine Description	Year of Manufacturing	Assembly Plant	Month of Manufacturing	Serial Number

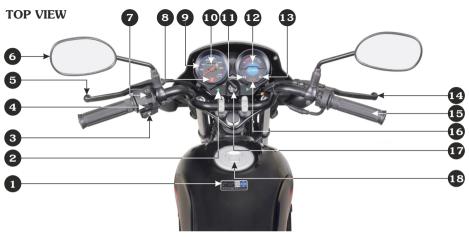
Model: HF 100

Variants	VIN	Engine
Kick Start/Drum/Cast Wheel	HAC11	HA11EB

#### VIN and Engine No. may be required:

- 1. During registration of the vehicle.
- 2. For dealing with legal & insurance departments.

#### **VEHICLE VIEWS**



- (1) QR code/E20 sticker
- (2) Turn signal indicator
- (3) Horn switch
- (4) Turn signal lamp switch
- (5) Clutch lever
- (6) Rear view mirror
- (7) Headlamp dimmer switch
- (8) Side stand indicator
- (9) Speedometer
- (10) Odometer

- (11) Neutral indicator
- (12) Fuel gauge
- (13) High beam indicator
- (14) Front brake lever
- (15) Throttle grip
- (16) Programmed FI malfunction indicator lamp (MIL)
- (17) Ignition switch with steering lock
- (18) Fuel tank cap

\*Accessories and features shown may not be part of standard fitment.



- (1) Gear shift pedal
- (2) Main stand
- (3) Left side cover
- (4) Side stand
- (5) Saree guard with women (10) Rear grip pillion step
- (6) Rear fender
- (7) Rear turn signal lamp (12) ECU (Inside)
- (8) Rear reflex reflector
- (9)Tail/stop lamp (14) Front fender

- (11) Side stand switch
- (13) Front turn signal lamp
- (13) Side reflex reflector

\*Accessories and features shown may not be part of standard fitment.



\*Accessories and features shown may not be part of standard fitment.

# **VEHICLE SPECIFICATION**

ITEM		SPECIFICATIONS			
Dimensions					
Overall length		1965 mm			
Overall width		720 mm			
Overall height		1045 mm			
Wheelbase		1235 mm			
Saddle height		805 mm			
Ground clearance		165 mm			
Weight					
Kerb weight		108 kg			
Capacities					
Engine oil		1.15 litres at disassembly and 1 litre at draining			
Fuel tank		9.1 litres			
Engine					
Maximum power		5.9 kW @ 8000 r/min			
Maximum torque		0.82 kgf-m (8.05 N-m) @ 6000 r/min			
Bore and stroke		50.0x49.5 mm			
Compression ratio		9.9:1			
Displacement		97.2 cc			
Spark plug		NGK-CR7HSA, BOSCH-UR4AC, Champion-P-RZ9HC (Federal Mogul)			
Spark plug gap		0.6-0.7 mm			
Valve clearance	Intake	0.10 mm			
Valve clearance	Exhaust	0.10 mm			
Idle speed		1400±100 r/min in hot condition			
Chassis and suspension					
Front suspension		Telescopic hydraulic shock absorbers			
Rear suspension		Swing arm with 2 step adjustable hydraulic shock absorbers			
Caster angle		26°			

#### **VEHICLE SPECIFICATION**

VEHICLE SPECIFICATION ITEM	JIN	SPECIFICATIONS		
Trail length		89 mm		
Trair length	Front	2.75x18-4 PR/42P		
Tyre size	Rear	2.75x18-6 PR/48P		
	Front	Internal expanding shoe type, 130 mm		
Brakes		Internal expanding shoe type, 130 mm		
Didnes	Rear	(Integrated braking system)		
Transmission		^ -		
Primary reduction		3.722 (67/18)		
Final reduction		3.143 (44/14)		
Gear ratio, 1 <sup>st</sup>		3.182 (35/11)		
2 <sup>nd</sup>		1.706 (29/17)		
3 <sup>rd</sup>		1.238 (26/21)		
4 <sup>th</sup>		0.958 (23/24)		
Electricals				
Battery		*MF Battery, 12V-3Ah/ETZ-3		
Alternator		135 W @ 5000 r/min		
Headlamp (High/Low)		12V-35/35W (Halogen Bulb, Trapezoidal **MFR)		
Tail/Stop lamp		12V-5/21W-**MFR		
Turn signal lamp		12V-10Wx4 **MFR		
Meter illumination		12V-1.7Wx2		
Neutral indicator		12V-1.7W		
Turn signal indicator		12V-3.0Wx2		
Hi beam indicator		12V-1.7W		
Side stand indicator		LED		
Programmed-Fi Malfunction in	ndicator lamp (MIL)	LED		
Fuse	Fuse box (A)	15A,10A (Circuit fuse) & 15A, 10A (Spare fuse)		
ruse	(Fuse box (B)	10A (Circuit fuse) & 10A (Spare fuse)		
		* ME stands for Maintenance Free		

<sup>\*</sup> MF stands for Maintenance Free

<sup>\*\*</sup> MFR stands for Multi-Focal Reflector

#### **ACCESSORIES & MODIFICATIONS**

Modifying your vehicle or using non-Hero MotoCorp accessories can make your vehicle unsafe. Before you consider making any modifications or adding an accessory, be sure to read the following information.

### / WARNING

- Improper accessories or modifications can cause a crash in which you can be seriously hurt or killed.
- Follow all instructions in this owner's manual regarding accessories and modifications.

#### Accessories

- Make sure that the accessory does not obscure any lamps, reduce ground clearance, limit suspension travel or steering travel, affect your riding position or interfere with operating any controls.
- Be sure electrical equipment does not exceed the vehicle's electrical system capacity (page 6). A blown fuse can cause a loss of lights.
- Do not pull a trailer or sidecar with your vehicle. This vehicle was not designed for these attachments, and their use can seriously impair your vehicle's handling.

#### **Modifications**

We strongly advise you not to remove any original equipment or modify your vehicle in any way that would change its design or

operation. Such changes could seriously impair your vehicle's handling, stability and braking, making it unsafe to ride. Removing or modifying your lamps, mufflers, emission control system or other equipment can also make your vehicle illegal.

#### **ANTI-THEFT TIPS**

- Always lock the steering and never leave the key in the ignition switch. This sounds simple but people do forget.
- Be sure the registration information for your vehicle is accurate and correct.
- Park your vehicle in a locked garage whenever possible.
- Use an additional anti-theft device of good quality.
- Never park your vehicle in an isolated area.
   Park as far as possible in a designated area.
- Keep a note in your vehicle all the time with your name, address and contact details.

# VEHICLE SAFETY INFORMATION

Your vehicle can provide many years of service and pleasure if you take responsibility for your own safety and understand the challenges you can meet on the road.

There is much that you can do to protect yourself when you ride. You will find many helpful recommendations throughout this manual. Following are a few that we consider most important.

#### Always wear a helmet

It is a proven fact, helmet significantly reduces the number and severity of head injuries. So always wear a helmet and make sure your pillion rider does the same. We also recommend that you wear eye protection, sturdy boots, gloves and other protective gear.

#### Before riding your vehicle

Make sure that you are physically fit, mentally focused and free of alcohol and drugs. Check that you and your pillion are both wearing an approved vehicle helmet and protective apparel. Instruct your pillion on holding onto the grab rail or your waist, leaning with you in turns, and keeping their feet on the footrest, even when the vehicle is stopped.

# Take time to learn & practice your vehicle

Even if you have ridden other vehicles, practice riding in a safe area to become familiar with how this vehicle works and handles, and to become accustomed to the vehicle's size and weight.



#### Ride defensively

Always pay due attention to other vehicles around you, and do not assume that other drivers see you. Be prepared to stop quickly or perform an evasive maneuver.

### Make yourself easily visible

Some drivers do not see vehicles because they are not looking for them. To make yourself more visible, wear bright reflective clothing, position yourself so that others can see you, signal before turning or changing lanes, and use horn which will help others to notice you.

# Ride within your limits

Pushing the limits is another major cause of vehicle accidents. Never ride beyond your personal abilities or faster than conditions demand. Remember that fatigue and negligence can significantly reduce your ability to make good judgements and ride safely.

#### Do not drink and ride

Riding under the influence of alcohol or drugs is dangerous. Alcohol can reduce your ability to respond to changing conditions and reduce the reaction time. Do not drink and ride.

### Keep your vehicle in safe condition

For safe riding, it's important to inspect your vehicle before every ride and perform all recommended maintenance. Never exceed load limits, and use accessories that have been recommended by Hero MotoCorp for this vehicle.

#### If you are involved in a crash

Personal safety is your first priority. If you or anyone else has been injured, take time to assess the severity of the injuries and whether it is safe to continue riding. Call for emergency assistance if needed. Also follow applicable laws and regulations if another person or vehicle is involved in the crash.

the condition of your vehicle. If the engine is riding gear because it offers the best still running, turn it off. Inspect for fluid leaks, protection against head injuries. A helmet check the tightness of critical nuts and bolts, should fit your head comfortably and securely. and check the handlebar, brake levers, brakes. A bright coloured helmet can make you more and wheels. Ride slowly and cautiously. Your noticeable in traffic, as can reflective strips. vehicle may have suffered damage that is not An open-face helmet offers some protection, immediately apparent. Have your vehicle but a full-face helmet offers more. Always thoroughly checked at a qualified service wear face shield or goggles to protect your facility as soon as possible.

#### PROTECTIVE APPAREL

For your safety, we strongly recommend that In addition to a helmet and eye protection, we you always wear an approved helmet (ISI also recommend: marked), eve protection, boots, gloves, long • Sturdy boots with non-slip soles to help pants and a long sleeve shirt or jacket whenever you ride. Take care of loose/. hanging clothes while solo/pillion riding. Although complete protection is not possible. wearing proper gear can reduce the chance of • A two wheeler riding suit or jacket for injury when you ride.

Following are suggestions to help you choose proper riding gear.

# / WARNING

- Not wearing a helmet increases the chance of serious injury or death in a crash.
- Be sure you and your pillion always wear a helmet, eve protection and other protective apparel when you ride.

#### Helmets and eye protection

If you decide to continue riding, first evaluate Your helmet is your most important piece of

# eves and help your vision. Additional riding gear

- protect your feet and ankles.
- Leather gloves to keep your hands warm and help prevent blisters, cuts, burns, and bruises.
- comfort as well as protection. Bright coloured reflective clothing can help make vou more noticeable in traffic. Be sure to avoid loose clothes that could get caught on any part of your vehicle.

# Hero RideSafe

#### SAFE RIDING TIPS

#### Do's:

- Always conduct simple pre-ride inspection (page 18).
- · Always wear a helmet (ISI marked) with chin strap securely fastened and insist on a helmet for your pillion rider.
- While riding, sit in a comfortable position with your legs close to fuel tank.
- (between  $40-50 \,\mathrm{km/hr}$ ).
- To stop the vehicle (in IBS), press the rear brake pedal for the application of front and rear brakes simultaneously. However, for • Concentrate on the road and avoid talking more effective braking, use both brakes simultaneously, keeping throttle in the • Do not litter on the road. closed position.
- Respect road signs and obey traffic rules for your own safety and that of others on the road (page 55).
- During night time, dip headlamps of your vehicle for oncoming traffic, or when . Never take your hands off the steering following another vehicle.
- Give way to others on the road and signal before you make a turn.
- To make vourself more visible, wear bright reflective clothing that fits well.
- Tightly wrap loose/hanging clothes & avoid entangling with moving parts.
- Get vour vehicle serviced regularly by the Authorised Hero MotoCorp workshop.

#### Don't

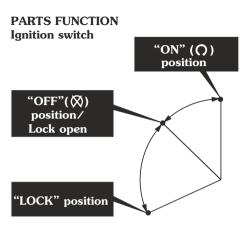
- Never use cell phone while riding the vehicle.
- · Avoid sudden acceleration, braking and turning of your vehicle.
- Never shift gears without disengaging the clutch and closing the throttle.
- Ride defensively and at a steady speed Never touch any part of the hot exhaust system like muffler.
  - Never ride under the influence of alcohol or drugs.
  - to the pillion rider or others on the road.

  - Do not cross the continuous white/yellow line in the center of the road, while overtaking.
  - · Do not attach large or heavy items to the handlebars, front forks, or fenders.
  - handle while riding.
  - Do not move the side stand down while riding, as engine will stop while vehicle is in gear (page 16) (Wheel locking leading to accident, part damage, etc.).

#### TIPS FOR HEALTHY ENVIRONMENT

The following tips shall ensure a healthy vehicle, healthy environment, and a healthy you.

- **Healthy engine:** The engine is the lifeline of every vehicle. To keep it healthy, it should be tuned regularly, which will also help reduce pollution and improve vehicle performance & fuel efficiency.
- Regular servicing: Get your vehicle serviced at an Authorised Hero MotoCorp workshop, as per the service schedule, for an optimum performance and keep the emission level under check.
- Genuine spares: Always insist on Hero MotoCorp genuine parts as spurious or incompatible spares and accessories can upset or deteriorate your vehicle's running condition.
- **Genuine engine oil:** Hero 4T Plus SAE 10W 30 SL grade (JASO MA2) engine oil is recommended by Hero MotoCorp and make sure you change it every 6000 km. (Top up if the oil level is at or near the lower level mark) to keep the engine fit and environment healthy.
- **Noise pollution:** Noise beyond a certain decibel is pollution. Whether it is from horns or defective mufflers, excessive noise will cause headaches and discomfort.
- Emission pollution: Get emission of your vehicle checked by Authorised agencies at least once every 3 months or as notified by the government from time to time.
- **Fuel saving & Reduce pollution:** Switch "OFF" the engine while waiting at traffic signal points to save fuel and reduce pollution, if the waiting period is long.
- **BS-VI grade fuel:** Always use BS-VI grade fuel to adhere BS-VI norms.





- 1. Ignition switch
- 2. Ignition key
- 3. Steering lock position

Key position	Key removal	
"ON" ( <b>೧</b> )	The engine can be started, turn signal lamps, horn, tail/stop lamp can be operated. Fuel gauge will be functional. Programmed FI malfunction indicator lamp (MIL) illuminates.	Key cannot be removed
"OFF"(♥) Engine cannot be started and no electrical system will be functional.		Key can be removed
"LOCK"	Steering can be locked.	Key can be removed

#### Instruments and Indicators

The indicators are in the speedometer panel above the headlamp. The functions are as below.



Sl. No.	Description	Function
1	Speedometer	Indicates driving speed.
2	Gear shifting	Maximum operating speed in each gear.
3	Odometer	Shows accumulated distance travelled.
4	Fuel gauge	Indicates approximate fuel quantity (page 14).
5	High beam indicator	Light glows when headlamp is in "Hi" beam.
6	Programmed-FI malfunction indicator lamp (MIL)	When the ignition switch is turned "ON" the programmed FI malfunction indicator lamp (MIL) glows continuously and then should go "OFF" once the engine is started. It indicates that programmed FI system is OK. If it glows continuously there is an abnormality in the programmed FI system, it is recommended to reduce the speed and drive to the Authorised Hero MotoCorp workshop for check—up.
7	Turn signal indicator (R)	Flashes when right turn signal switch is operated.
8	Neutral indicator	Light glows when vehicle is in neutral position.
9	Turn signal indicator (L)	Flashes when left turn signal switch is operated.
10	Side stand indicator	Light glows when the vehicle is parked on the side stand.

### (a) Fuel gauge

When fuel gauge needle (1) enters the red band (2), it indicates the fuel quantity is low and the fuel tank should be refilled as soon as possible.



# (1) Fuel gauge needle

(2) Red band

# ! CAUTION

Please ensure the vehicle is not used with fuel gauge needle at red band continuously. It will not only result in the vehicle running out of fuel, it may also cause serious damage to the fuel pump. Please ensure fuel is filled up as soon as the fuel gauge needle reaches red band.

# NOTE

To check the fuel level indication, the vehicle should be on levelled surface and in stationary condition.

#### **FEATURES**

### Steering lock

Steering lock with ignition switch, turn the ignition key (1) to "OFF" ((X)) position & turn the handle bar towards left or right & push the key downwards & turn towards "LOCK" position. After locking take out the key.



(1) Ignition key

# HANDLEBAR SWITCHES CONTROL Left handlebar controls

#### 1. Dimmer switch

Select " for high beam and " for low beam."

# 2. Turn signal lamp switch ( )

Shift the turn signal lamp switch (2) sideways for right/left indications and leave it to come back to its normal position on its own.

**IMPORTANT:** To switch "OFF" the turn signal after completing the turn, gently push inside.



- (1) Dimmer switch
- (2) Turn signal lamp switch
- (3) Horn switch

#### 3. Horn switch (►)

Press the horn switch (3) to operate the horn.

#### SIDE STAND INDICATOR/SWITCH

For the safety of the customer a side stand indicator (1) is provided.

A side stand switch (2) is provided in the side stand, when the vehicle is parked on side stand (Ignition switch "ON"), the switch enables the • Check the side stand for proper function side stand indicator lamp to glow on the speedometer panel.



(1) Side stand indicator



(2) Side stand switch

- (3) Spring
- and the spring (3) for damage or loss of tension and the side stand assembly for free movement.
- Check whether the side stand indicator (1) glows when the side stand is down.

- While the side stand is up, the side stand indicator (1) should not glow.
- If the side stand indicator (1) does not operate as described in above steps, please visit your Authorised Hero MotoCorp workshop.

#### ( CAUTION

Ensure that adequate care should be taken while cleaning the side stand switch.

# Your vehicle is equipped with "Side stand engine kill" feature for safety purpose.

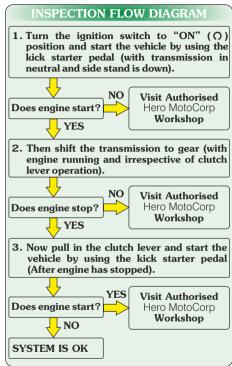
This feature has following functions:

- It prevents starting the engine when transmission is in gear (irrespective of clutch lever operation) and side stand is down.
- It stops the running engine when transmission is in gear (irrespective of clutch lever operation) and side stand is moved down.

# / WARNING

"Side stand engine kill" system is not affected by clutch lever operation.

To inspect the functionality of this feature, park the vehicle on its main stand and check all the conditions described in the inspection flow diagram:



If your vehicle doesn't operate as described in above flow diagram, please visit your Authorised Hero MotoCorp workshop.

### / WARNING

Regularly inspect the functionality of "Side stand engine kill" feature and in case of any malfunction visit Authorised Hero MotoCorp workshop.

#### **FUEL**

#### (a) Fuel tank

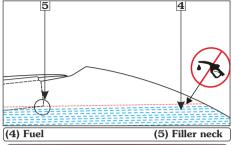
Fuel tank capacity is 9.1 litres (Be sure to fill the fuel tank when fuel gauge needle enters red band).

- To remove the fuel tank cap (1), lift the key hole cover (2) and insert the ignition key (3) turn it clockwise and remove the cap.
- Do not overfill the tank. There should be no fuel (4) in the filler neck (5).
- For locking, position the cap with "A" mark facing towards the front, back on the opening and press gently. The key springs back to the normal position and the cap gets locked.



(1) Fuel tank cap (3) Ignition key

(2) Key hole cover



# CAUTION

Do not park the vehicle under direct sunlight as it causes evaporation of petrol due to heat and deterioration of paint gloss due to ultra violet rays.

# **WARNING**

Petrol is extremely flammable and is explosive under certain conditions. Refill in a well ventilated area with the engine stopped. Do not smoke or allow flames or sparks in the area where the vehicle is refilled or where petrol is stored.

### (b) Petrol containing alcohol

Fuel available at your location may contain ethanol. Ethanol is a form of alcohol and is generally mixed with petrol to reduce emissions.

sticker on fuel tank indicates that the vehicle parts are compliant up to the blend of "20% ethanol with petrol".

It is recommended not to use petrol containing **PRE-RIDE INSPECTION** more than 20% of ethanol to avoid any damage to engine and other parts of the vehicle.

If you observe any problem related to the operational performance of the vehicle, contact your Authorized Hero MotoCorp workshop.



(1) E20 sticker

(2) Fuel tank

#### **CAUTION**

Please ensure the vehicle is not used with fuel gauge needle at red band continuously. It will not only result in the vehicle running out of fuel. it may also cause serious damage to the fuel pump. Please ensure fuel is filled up as soon as the fuel gauge needle reaches red band.

### **WARNING**

- · Petrol is highly flammable and explosive. You can be burned or seriously injured when handling fuel.
- · Stop the engine and keep heat, sparks and flame away.
- Refuel only outdoors.
- Wipe off spills immediately.

You should conduct pre-ride inspection before riding the vehicle to enhance riding comfort and safety.

Clean your vehicle regularly. It protects the surface finish. Avoid cleaning with products that are not specifically designed for vehicle surfaces. Inspect your vehicle every day before you start the engine. The items listed here will only take a few minutes, and in the long run they can save time, expense and possibly your life. Please follow the tips as given below:

- Engine oil level-Check and top up engine oil if required (page 28). Check for leaks.
- Programmed FI malfunction indicator lamp (MIL)-When the ignition switch is turned "ON" the programmed FI malfunction indicator lamp (MIL) glows continuously and then should go "OFF" once the engine is started.
- Fuel level-Ensure sufficient fuel is available in vour fuel tank for journey. Fuel level gauge needle should be above red band (page 14). Check for leaks.
- Front and Integrated brakes-Check operation. Adjust free play, if necessary (page 40).
- Tyres-Check condition and pressure (page 45).
- Clutch-Check for smooth operation. Adjust free play, if necessary (page 35).
- Drive chain-Check condition and slackness (page 37). Adjust and lubricate, if necessary.

- **Throttle**-Check for smooth opening and closing in all steering positions (**page 36**).
- Lamps and Horn-Check that headlamp, tail/stop lamp, turn signal lamps and horn function properly.
- Rear view mirror-Ensure that the rear view mirror gives a good rear view when you are sitting on the vehicle.
- Fitting & Fasteners-Check & tighten if necessary.
- Steering-Check for smooth action for easy maneuverability.
- **Side stand**-Check for proper functionality **(page 15).**

#### STARTING THE ENGINE

Always follow the proper starting procedure described below:

- To protect the catalytic converter in your vehicle's exhaust system, avoid extended idling and the use of leaded petrol.
- Your vehicle's exhaust contains poisonous carbon monoxide gas. High levels of carbon monoxide can collect rapidly in enclosed areas such as garage. Do not run the engine with the garage door closed.

#### ( CAUTION

This vehicle is equipped with a side stand engine kill feature (page 16).

#### **Preparation**

Before starting insert the key and follow the below mentioned procedure:

- Turn the ignition key (1) to "ON" (  $\Omega$ ) position.
- Confirm that the programmed FI malfunction indicator lamp (MIL) (2) glows continuously and then should go "OFF" once the engine is started.





- (1) Ignition key
- (2) Programmed FI malfunction indicator lamp (MIL)

#### NOTE

If MIL remains "ON" even if the vehicle is started, there is an abnormality in the programmed FI system. It is recommended to reduce the speed and drive to the Authorised Hero MotoCorp workshop for check-up

• Find neutral position & check neutral N indicator (3) on instrument console with ignition "ON".



#### (3) Neutral indicator

 Depress the kick starter until resistance is felt. Then let the kick starter return to the top of its stroke. Kick from the top of the stroke through to the bottom with a rapid, continuous motion.

#### **Starting Procedure**

At any ambient temperature, kick start the engine with the throttle completely closed.

# NOTE

- This vehicle has a fuel-injected engine with an idle air control valve (IACV).
- The engine will not start if the throttle is open because the Electronic control unit (ECU) cuts-off the fuel supply.

#### Flooded engine

If the engine fails to start after repeated attempts, it may be flooded with excess fuel.

- Open the throttle fully.
- · Kick start the engine several times.
- Follow the normal starting procedure.

- If the engine starts with unstable idle, open the throttle slightly.
- If the engine does not start wait for 10 seconds, then follow first 3 step again.

### Ignition cut off

Your vehicle is designed to automatically stop the engine & fuel pump, if vehicle falls down.

(Bank angle sensor cuts off the ignition).

# NOTE

If the vehicle has fallen down, before restarting the engine you must turn the ignition switch to "OFF" ( $\lozenge$ ) position and then back to "ON" ( $\bigcirc$ ) position.

#### Running in

Help assure your vehicle's future reliability and performance by paying extra attention to how you ride during the first 500 km.

During this period, avoid full-throttle starts and rapid acceleration.

# NOTE

- To start the engine if any gear is engaged, shift the transmission to neutral and kick start the engine.
- Do not open the throttle while starting the vehicle.

# / WARNING

Never run the engine in a enclosed area, the exhaust contains poisonous gases.

#### **RIDING**

- After the engine has been warmed up, the vehicle is ready for riding.
- While the engine is idling, press the clutch lever and lift the gearshift pedal from front to shift into 1<sup>st</sup> (low) gear.
- Slowly release the clutch lever and at the same time, gradually increase engine speed by opening the throttle. Coordination of the throttle and clutch lever will assure a smooth positive start.
- When the vehicle attains a moderate speed, close the throttle, press the clutch lever and shift to 2<sup>nd</sup> gear by depressing the gearshift pedal.
- The sequence is repeated progressively to shift 3<sup>rd</sup> and 4<sup>th</sup> (top gear).



# Recommended max. operating speed in each gear.

$1^{\text{st}}$	25 km/hr	$2^{nd}$	<b>45</b> km/hr
$3^{rd}$	<b>70</b> km/hr	$4^{^{\text{th}}}$	100 km/hr

# CAUTION

Do not shift gears without operation of clutch and without closing the throttle otherwise this would lead to damage of gears.

#### BRAKING

- For normal braking, close the throttle and gradually apply both front and rear brakes simultaneously while shifting down gears to suit your road speed.
- For sudden deceleration/quick stopping, close the throttle and apply the front and rear brakes simultaneously.

### For integrated braking system (IBS)

To stop the vehicle, press the rear brake pedal for the application of front and rear brakes simultaneously. However, for more effective braking, it is advised to apply front and rear brake simultaneously, keeping the throttle in closed position.

# / WARNING

- When riding in wet or rainy conditions, or on loose surfaces, apply front brake carefully after applying rear brake to avoid wheel slip.
- Extreme braking may cause wheel locking and reduce control over the vehicle.
- Wherever possible, reduce speed or apply brake before entering a turn, closing the throttle or braking in mid turn may cause wheel slip. Wheel slip will reduce control over the vehicle.
- When riding in wet or rainy conditions, or on loose surfaces the ability to stop the vehicle reduces.

- All your actions should be smooth under these conditions. Sudden acceleration, braking or turning may cause loss of control. For your safety, exercise extreme caution when braking, accelerating or turning.
- When descending a long steep slope use engine braking (power) by changing to lower gears, with intermittent use of both brakes. Continuous brake application can overheat the brakes and reduce their effectiveness.

#### **PARKING**

After stopping the vehicle, shift the transmission to neutral, turn the ignition switch "OFF"  $(\mbox{\ensuremath{\mbox{$M$}}})$ , park the vehicle on main stand, lock the steering and remove the key.

### ( CAUTION

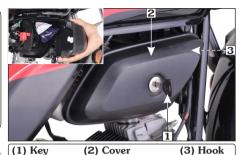
- Park the vehicle on firm level ground to prevent overturning.
- While parking vehicle on side stand engage the first gear.

#### **UTILITY BOX**

To store some utility items a utility box has been provided.

To open, insert the key (1), rotate it clockwise, pull the cover (2), and slide it sideways to disengage it from the hook (3).

To close, engage the hook and press gently. Hold the key in clockwise direction, slide the cover back and release the key.



#### TOOLKIT/FIRST AID KIT

The tool kit (1) is stored in the utility box. Some emergency repairs, minor adjustments and parts replacement can be performed with the tools contained in the kit.

Kit consists of following tools:

- Tool bag-1 No.
- +, No. 2 driver-1 No.
- Grip-1 No.
- Box wrench P16x14-1 No.
- Spanner 10x12-1 No.
- Pin spanner-1 No.

The first aid kit (2) is stored in the utility box. For some emergency first aid can be performed by medicine contained in the kit. Kit contains the following items:

- Antiseptic cream-1 No.
- Sterilized dressing-1 No.
- Water proof plaster-1 No.
- Elastic bandage-1 No.

- Gauze (Rolled bandage) 1 No.
- Sterilized elastic plaster-1 No.
- First aid bag-1 No.
- Hemostatic agent-1 No.



(1) Tool kit

(2) First aid kit

#### CLEANING AND WASHING OF VEHICLE

Follow the below mentioned steps for washing the vehicle.

- Wet the vehicle with light water spray. Avoid directing water meter console, muffler outlets and electrical parts.
- Clean the headlamp lens and other plastic parts using a cloth or sponge dampened with a solution of mild detergent and water.
- Rub the soiled area gently rinsing it frequently with fresh water.
- After cleaning spray water thoroughly.
- Dry the vehicle by wiping with dry soft cloth.

#### NOTE

- Our authorised dealership take all above mentioned precautions like recommended detergents and usage of muffler caps/plugs during wash to ensure quality wash.
- Do not use high pressure water (or air). It can damage certain parts of the vehicle.

#### MAINTENANCE

#### Importance of maintenance

A well-maintained vehicle is essential for safe economical and trouble-free riding. It will also help reduce pollution.

To help you, take proper care of your vehicle, the following pages include a maintenance schedule and a maintenance record for regular scheduled maintenance.

These instructions are based on the assumption that the vehicle will be used exclusively for its designed purpose.

Sustained high speed operation or operation in unusually wet or dusty conditions will require more frequent service than specified in the maintenance schedule.

Consult your Authorised Hero MotoCorp Dealer for recommendation applicable to your individual needs and use.

If your vehicle overturns or is involved in a crash, be sure that you visit your Authorised Hero MotoCorp workshop for detailed inspections.

### / WARNING

- Improperly maintaining this vehicle or failing to correct a problem before you ride can cause a crash in which you can be seriously hurt or killed.
- Always follow the inspection and maintenance recommendations and schedules in this owner's manual

#### Maintenance safety

This section includes instructions on some important maintenance tasks. You can perform some of these tasks with the tools provided (if you have basic mechanical skills). Other tasks that are more difficult and require special tools are best performed by professionals. It is recommended that wheel removal should normally be handled by a Hero MotoCorp authorised workshop.

You will come across some of the most important safety precautions in the following pages of this manual.

However, we cannot warn you of every conceivable hazard that can arise in performing maintenance. Only you can decide whether or not you should perform a given task.

### / WARNING

- Failure to follow maintenance instructions and precautions properly can seriously injure you.
- Always follow the procedures and precautions in this owner's manual.

#### SAFETY PRECAUTIONS

- Make sure the engine is "OFF" before you begin any maintenance or repair. This will help to eliminate several potential hazards:
  - Carbon monoxide poisoning from engine exhaust.

Be sure there is adequate ventilation whenever you operate the engine.

• Burns from hot parts.

Let the engine and exhaust system cool before touching.

• Injury from moving parts.

Do not run the engine unless instructed to do so.

- Read the instruction before you begin and make sure you have the tools and skills required.
- To help prevent the vehicle from falling over, park it on a firm, level surface on the main stand.
- To reduce the possibility of a fire or explosion, be careful when working around petrol or batteries. Use only nonflammable solvent, not petrol, to clean parts. Keep cigarettes, sparks and flames away from the battery and all fuel-related parts.

Remember that your Authorised Hero MotoCorp workshop knows your vehicle best and is fully equipped to maintain and repair it. To ensure best quality and reliability, it is recommended to use Hero MotoCorp genuine parts for repair and replacement.

#### MAINTENANCE SCHEDULE

Perform the pre-ride inspection (page 18) at each scheduled maintenance period.

#### I: INSPECT C: CLEAN R: REPLACE A: ADJUST L: LUBRICATE E: EMISSION CHECK

The following maintenance schedule specifies all maintenance required to keep your vehicle in peak operating condition. Maintenance work should be performed in accordance with standards and specifications of Hero MotoCorp by properly trained and equipped technicians. Your Authorised Hero MotoCorp workshop meets all of these requirements.

Ensure that each paid service is availed within  $180\ \text{days}$  or  $6000\ \text{km}$  from the date of previous service, whichever is earlier.

- To be serviced by your Authorised Hero MotoCorp workshop unless the owner has the relevant tools, technical information and is technically qualified.
- In the interest of safety, we recommend that these jobs are carried out only by your Authorised Hero MotoCorp workshop.
- **Note-1**: At higher odometer readings, repeat the frequency interval established here.
- Note-2 : Replace air cleaner element once in every 18000 km or early replacement may be required when riding in dusty areas.
- Note-3 : Customer can visit Authorised Hero MotoCorp workshop in case tappet noise observed before 6000 km.
- Note-4 : Replace engine oil at 1st service and then every 6000 km. Top up if the oil level is at or near the lower level mark.
- Note-5 : Visit Authorised Hero MotoCorp workshop for inspection, cleaning, lubrication and adjustment of drive chain at every 2000 km.
- **Note-6**: Frequent lubrication of drive chain is recommended for better life of drive chain—when running dry or running in very sever dusty & wet/rainy condition.
- Note-7 : More frequent cleaning and lubrication is needed when running in an unusually dusty and wet environment or rainy condition.
- Note-8: Inspect & maintain specified torque.
- **Note-9**: Inspect the bearings free play, replace if necessary.
- Note-10: Replace front fork oil once in a every 2 years or 30000 km, whichever is earlier.
- **Note-11**: Inspect for any play in the mounting bushes, replace if necessary.
- Note-12: Check CO emission at idle.
- **Note-13:** Inspect the canister hoses for deterioration, damage or loose connections and canister for cracks or other damages.

#### Note

- Always wipe the water from the vehicle after washing. Use clean soft cloth or pressurized air for completely
  drying the water.
- Always replace gaskets, O-rings, circlips and cotter pins with new one once removed.
- # Replacement of parts (e.g filters, etc.) and consumables (e.g engine oil, etc.) during paid or free service are at customer's expenses.

#### MAINTENANCE SCHEDULE

Dear Customer,

We would strongly recommend the following schedule, to keep your vehicle in perfect running condition and healthy environment. Vehicle subjected to severe use or ridden in dusty area will require more frequent servicing.

		WHICHEVER COMES FIRST	*DURING FREE SERVICE PERIOD				DURING PAID SERVICE PERIOD	
	ITEMS	SERVICE	1**	2 <sup>nd</sup>	2 <sup>nd</sup> 3 <sup>nd</sup>	<b>4</b> <sup>th</sup>	ONCE IN EVERY 6000 KM	
ITEMS		DAYS	1st 60	Next 180	Next 180	Next 180	ONCE IN EVENT GOOD IN	
		KM Note-1	500- 750	6000- 6500	12000- 12500	18000- 18500	6000	12000
	Fuel Line		I	I	I	I	I	I
1	Throttle Operation		I, A	I, A	I, A	I, A	I, A	I, A
`	Air Cleaner Element	Note-2	Do not oper there is	Do not open air cleaner element unless there is a drivability problem			Do not open air cleaner element unless there is a drivability problem	
	Spark Plug		I, C, A	I, C, A	R	I, C, A	I, C, A	R
Ж	Valve Clearance	Note-3	I, A	I, A	I, A	I, A	I, A	I, A
	Engine Oil	Note-4	R	R	R	R	R	R
Ж	Engine Oil Strainer Screen		С	С	С	С	С	С
*	Engine Oil Centrifugal Filter		С	С	С	С	С	С
	Oil Circulation		I	I	I	I	I	I
Ж	Drive Chain	Note-5 & 6		I, C, L, A at e	every 2000 k	m	I, C, L, A at e	very 2000 km
	Drive Chain Slider		I	I	I	I	I	I
	Battery Voltage		I	I	I	I	I	I
	Brake Shoe		I, C, A	I, C, A	I, C, A	I, C, A	I, C, A	I, C, A

WHICHEVER COMES FIRST SERVICE		*DURING FREE SERVICE PERIOD				DURING PAID SERVICE PERIOD		
		SERVICE	1**	2 <sup>nd</sup>	3"	<b>4</b> <sup>th</sup>		RY 6000 KM
	ITEMS	DAYS	1st 60	1st 60 Next 180	Next 180	Next 180	ONCE IN EVE	KI GOOG KM
		KM Note-1	500- 750	6000- 6500	12000- 12500	18000- 18500	6000	12000
`	Brake System (Brake Cam & Brake Pedal)	Note-7	I, C, L	I, C, L	I, C, L	I, C, L	I, C, L	I, C, L
1	Stop Lamp Switch		I, A	I, A	I, A	I, A	I, A	I, A
1	Headlamp Focus		I, A	I, A	I, A	I, A	I, A	I, A
	Clutch Lever Free Play		I, A	I, A	I, A	I, A	I, A	I, A
	Side Stand Pivot Bolt		C, L	C, L	C, L	C, L	C, L	C, L
	Rear Brake Pedal/ Main Stand Pivot	Note-7	C, L	C, L	C, L	C, L	C, L	C, L
	Side Stand Switch		I, C	I, C	I, C	I, C	I, C	I, C
1	Nut, Bolts & Fasteners	Note-8	I	I	I	I	I	I
×	Wheels Bearings	Note-9	I	I	I	I	I	I
×	Wheel/Tyres		I	I	I	I	I	I
×	Steering Head Bearing		I	I, A	I, L, A	I, A	I, A	I, L, A
×	Front Suspension/ Oil Leakage	Note-10	I	I	I	I	I	I
1	Rear Suspension	Note-11	I	I	I	I	I	I
×	Muffler (Catalytic Converter)	Note-12		I, E	I, E	I, E	I, E	I, E
`	Evaporative Emission Control System	Note-13	I	I	I	I	I	I

# SPARK PLUG INSPECTION Recommended spark plugs: NGK-CR7HSA, BOSCH-UR4AC, Champion-P-RZ9HC (Federal Mogul)

For most riding conditions this spark plug heat range number is satisfactory. However, if the vehicle is going to be operated for extended periods at high speeds or near maximum power in hot climates, the spark plug should be changed to a cold heat range number, consult Authorised Hero MotoCorp workshop on this if required.

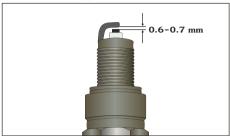
- Clean any dirt around the spark plug base.
- Disconnect the noise suppressor cap (1) and remove the spark plug (2) with the help of spark plug box wrench provided in the tool baq.



(1) Noise suppressor cap

(2) Spark plug

 Visually inspect the spark plug electrodes for wear. The center electrode should have square edges and the side electrode should not be eroded. Discard the spark plug if there is apparent wear or if the insulator is cracked or chipped.



- Make sure that the spark plug gap is
   0.6-0.7 mm using a wire-type feeler
   gauge. If adjustment is necessary, bend the
   side electrode carefully. Make sure the plug
   washer is in good conditions.
- With the plug washer attached, thread the spark plug in by hand to prevent crossthreading.
- Tighten a new spark plug 1/2 turn with spark plug wrench to compress the washer.
   If you are reusing a plug, it should only take 1/8-1/4 turn after the plug seats.

#### **ENGINE OIL**

Use hero genuine engine oil or recommended grade oil.

BRAND: Hero 4T plus GRADE: SAE 10W 30 SL Grade (JASO MA2).

#### Manufactured by:

- Tide Water Oil Co. (India) Ltd.
- Savita Oil Technologies Limited.
- Bharat Petroleum Corporation Limited.

#### OIL CAPACITY:

#### 1.15 litres (at disassembly)

#### 1 litres (at draining)

# Engine oil level inspection/Top up . If required, add the specified oil up to the process

Check engine oil level each day before • Reinstall the oil level dipstick and check for operating the vehicle.

The oil level dipstick (1) is on the right crankcase cover for measuring oil level. Oil level must be maintained between the upper (2) and lower (3) level marks on the oil level dipstick.

Do top up if oil level reaches towards the lower level mark.



- 1. Oil level dipstick
- 2. Upper level mark
- 3. Lower level mark

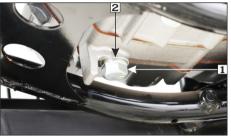
- Park the vehicle on its main stand.
- Start the engine & let it idle for 3-5 minutes
- Stop the engine and wait for 2-3 minutes.
- Remove the oil level dipstick, wipe it clean and insert without screwing it in.
- Remove the oil level dipstick and check the oil level
- upper level mark. Do not overfill.
- oil leaks.

# Engine oil replacement process/ Oil circulation inspection

Drain engine oil with the engine warm and the vehicle on its main stand.

- To drain the oil, remove the oil level dipstick and drain bolt (1) with sealing washer (2).
- After the oil has completely drained, reinstall the drain bolt with a new sealing washer.
- Fill the crankcase through the oil filler hole with 1 litres (approximately) of the recommended grade oil as the right crankcase cover is not removed.
- Reinstall the oil level dipstick with a new O-ring.
- Start the engine and allow it to idle for few minutes.

- Stop the engine, let the engine oil settle OIL FILTER SCREEN & CENTRIFUGAL down and recheck the oil level.
- · Make sure that oil level is at the "UPPER" level mark of the oil level dipstick with the vehicle in an upright position and that there are no oil leaks.



(1) Drain bolt

(2) Sealing washer

# **CAUTION**

- Running the engine with insufficient oil can cause serious engine damage.
- Running the engine with excessive oil can cause spark plug fouling & loss in performance.
- · Engine oil is a major factor affecting the performance and service life of the engine. Non-detergent, vegetable or castor based racing oils are not recommended.

# FILTER

- Drain the engine oil thoroughly (page 29).
- Remove the kick starter pedal (1), muffler (2), disconnect the clutch cable (3) and rider footrest (4). Remove the right crankcase cover (5).



- (1) Kick starter pedal
- (2) Muffler (4) Rider footrest
- (3) Clutch cable
- (5) Right crankcase cover
- Remove the gasket (6) and dowel pins (7) (2 nos.).
- Remove the oil filter screen (8) and wash it with non flammable or high flash point solvent (kerosene).
- Reinstall the filter screen with the sharp edge inside facing inwards.



- (6) Gasket
- (7) Dowel pins
- (8) Oil filter screen
- (9) Centrifugal filter cover
- Remove centrifugal filter cover with gasket (9) & clean the centrifugal filter (10) with non flammable or high flash point solvent AIR CLEANER (kerosene).



(10) Centrifugal filter

- Reinstall the centrifugal filter cover with new gasket.
- Reinstall the dowel pins and new gasket.
- Install the right crankcase cover, rider footrest, muffler, kick starter pedal and clutch cable.
- Fill the crankcase with clean engine oil as per specification.
- Adjust the clutch cable free play (page 35).

#### NOTE

- Clean filters as specified in the maintenance schedule.
- Ensure to replace gasket with new one once removed.

### Air cleaner element inspection

The air cleaner element is viscous type, it should be replaced at specified intervals (page 25). Early replacement may be required when riding in unusually wet or dusty area.



- (1) Left side cover
- (2) Side cover bolt
- (3) Lug
- (4) Direction indicator
- Remove the left side cover (1) by removing side cover bolt (2). Pull out lug (3) from the grommet and slide the cover as per direction indicator (4).

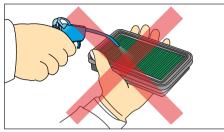


- (5) Air cleaner cover screws
- (6) Air cleaner cover

- Remove the air cleaner cover screws (5) and the cover (6).
- Remove the air cleaner element (7) from air cleaner housing (8).



- (7) Air cleaner element (8) Air cleaner housing
- Clean the air cleaner housing using a shop towel.
- Install the new air cleaner element
- Install the air cleaner element cover.
- Install the left side cover.





# ( CAUTION

- Never wash or clean the viscous filter. Replace filter element once in every 18000 km.
- Replace it earlier if the air cleaner:
  - Becomes very dirty.
  - Gets damaged on the surface.
  - Sealing area gets damaged.

# Air cleaner drain tube plug cleaning

Remove the drain tube (1) and drain the deposit into a container.

Follow the above process more frequently when riding in rain or at full throttle.



(1) Drain tube

#### VALVE CLEARANCE ADJUSTMENT

Excessive valve clearance will cause noise, and little or no clearance will prevent the valve from closing and cause valve damage and power loss. Check valve clearance at the specified intervals (page 23).

# NOTE

- The checking or adjusting of valve clearance should be performed while the engine is cold. The clearance will change as the engine temperature rises.
- Customer can visit Authorised Hero MotoCorp workshop in case tappet noise observed before 6000 km.
- · Remove the horn.
- Remove the tappet covers (1) with O-rings and cylinder head left side cover (3) with gasket (2) by removing the bolt/sealing washer.





- (2) Gasket
- (3) Culinder head left side cover
- Remove the timing hole cap (4) with O-ring. Rotate the cam sprocket (7) 'T' mark (5) on the fluwheel coincides with the index mark (6) on the left crankcase cover. In this position the piston will either **Standard clearance** be on the compression or exhaust stroke. The adjustment must be made when the piston is at Top Dead Center and both the inlet and exhaust valves are closed. This condition can be determined by moving the rocker arms. If they are free, it is an indication that the valves are closed and the piston is in compression stroke. If they are tight, the valves are open, rotate the cam sprocket (7) 360° clockwise and re-align the 'T' mark with the index mark.





- (4) Timing hole cap
- (5) 'T' mark
- (6) Index mark
- (7) Cam sprocket (8) Special tool
- clockwise using the special tool (8) until the Check the clearance by inserting the feeler gauge (9) between the adjusting screw (10) and valve stem (11).

Intake: 0.10 mm Exhaust: 0.10 mm

- · Adjust by loosening the lock nut (12) and turning the adjusting screw until there is a slight drag on the feeler gauge.
- · After tightening the lock nut, check again the clearance.
- · Install all parts in the reverse order of disassembly.



(9) Feeler gauge (11) Valve stem

(10) Adjusting screw (12) Lock nut

# NOTE

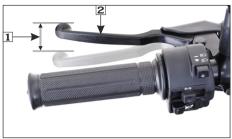
- Before inserting the feeler gauge, smear a bit of engine oil on the feeler gauge to avoid damage to the feeler gauge.
- Ensure to replace gasket and O-rings with new one once removed.

# CLUTCH LEVER FREE PLAY Adjustment

Clutch adjustment may be required if the vehicle stalls when shifting into gear or tends to creep or if the clutch slips, causing acceleration to lag behind engine speed.

Normal clutch lever free play (1) is 10–20 mm at the lever (2).

 To adjust the free play, loosen the lock nut (3). Turn the adjusting nut (4) to obtain the specified free play. Tighten the lock nut and check the adjustment.



(1) Free play: 10-20 mm (2) Clutch lever



(3) Lock nut (4) Clutch cable adjusting nut (A) Decrease free play (B) Increase free play

 Start the engine, press the clutch lever and shift into gear. Make sure the engine does not stall, and vehicle does not creep. Gradually release the clutch lever and open the throttle. The vehicle should start smoothly and accelerate.

#### Other checks

- wear that could cause sticking or failure. Free play adjustment
- Check for clutch cable model. Use genuine (a) At handlebar side clutch cables.
- Check for clutch cable routing.

# NOTE

If proper adjustment cannot be obtained or the clutch does not work correctly, visit your Authorised Hero MotoCorp workshop.

### THROTTLE OPERATION

# Cable inspection

Check for smooth rotation of the throttle grip from the fully open to the fully closed position. Check at full left and full right steering positions. Inspect the condition of the throttle cable from the throttle grip down to the throttle body. If the cable is kinked, chafed or improperly routed, it should be replaced or rerouted

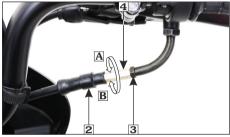


(1) Free play: 2-6 mm

Standard throttle grip free play (1) is • Check the clutch cable for kinks or signs of approximately 2-6 mm of grip rotation.

To adjust the free play, slide the boot (2), loosen the lock nut (3) and turn the adjuster (4). After adjustment, tighten the lock nut and slide the boot on the adjuster and lock nut securely.

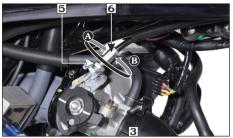
If the specified free play is not achieved, adjust the free play on throttle body side.



(3) Lock nut (2) Boot (4) Adjuster (A) Decrease free play (B) Increase free play

# (b) At throttle body side

Loosen the lock nut (5). Turn the adjusting nut (6) to obtain the specified free play. Tighten the lock nut and check the adjustment.



(5) Lock nut (A) Decrease free play (B) Increase free play

(6) Adjuster



(1) Drive chain (3) Drive chain slack 25 mm

#### DRIVE CHAIN SLACKNESS

The service life of the drive chain depends upon proper lubrication and adjustment.

Poor maintenance can cause premature wear or damage to the drive chain and sprockets.

The drive chain (1) should be checked and lubricated as part of the pre-ride inspection (page 18). Under severe usage, or when the vehicle is ridden in unusually dusty areas. more frequent maintenance will be necessary.

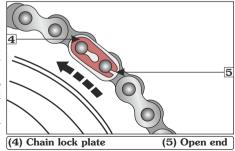
# Inspection

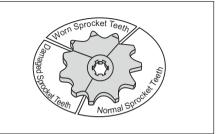
- Turn the engine "OFF", park the vehicle on its main stand and shift the transmission to neutral. Remove hole cap (2).
- Drive chain slack (3) should be adjusted to allow approximately 25 mm vertical movement by hand.

Rotate the wheel and check drive chain slack as the wheel rotates. Drive chain slack should remain constant as the wheel rotates.

If the chain is slack in one section and tight in another, some links are kinked and binding. Binding can be eliminated by frequent lubrication.

• Turn the chain to view chain lock plate (4) inside the hole. Ensure that the chain lock plate open end (5) is installed in the opposite direction of the chain rotation.





- Inspect the sprocket teeth for wear or damage.
- If the drive chain or sprockets are excessively worn or damaged, they should be replaced. Never use a new chain with worn out sprockets since this will result in rapid chain wear.

# Adjustment

- Park the vehicle on its main stand with the transmission in neutral and the ignition switch in "OFF" position.
- Loosen the rear axle nut (1) and sleeve nut (2). Loosen both the drive chain lock nuts (3).
- Turn both the adjusting nuts (4) in an equal number of turns until the correct drive chain slack is obtained. Turn the adjusting nut clockwise to decrease the slack or anticlockwise to increase the slack of the chain.
- Align the chain adjuster index mark (5) with the corresponding scale graduations (6) on both the sides of the swing arm equally.



(1) Rear axle nut



- (2) Sleeve nut
- (3) Drive chain lock nut
- (4) Drive chain adjusting nut
- (5) Index mark (6) Scale graduation
- If the drive chain slack is excessive when the rear axle is moved to the farthest limit of adjustment, the drive chain is worn and must be replaced. Tighten the sleeve nut and rear axle nut.
  - Sleeve nut torque: 4.4 kgf-m
  - Rear axle nut torque: 5.4 kgf-m

- Check the drive chain slack again.
- Rear brake pedal free play and stop lamp switch free play are affected when repositioning the rear wheel to adjust drive chain slack. Check rear brake pedal free play and adjust as necessary (page 41).

#### Lubrication

- Turn the engine "OFF", park the vehicle on its main stand and shift the transmission into neutral.
- Lubricate the drive chain by applying liberal amount of SAE#90 oil.

# ( CAUTION

Regular adjustment and lubrication as per the maintenance schedule would ensure high performance and longer life.

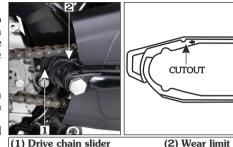
# NOTE

Visit Authorised Hero MotoCorp workshop for inspection, cleaning, lubrication and adjustment of drive chain at every 2000 km.

#### DRIVE CHAIN SLIDER INSPECTION

(Refer to "Maintenance Schedule" on (page 25).

Check the drive chain slider (1) for wear, the chain slider must be replaced if it is worn to the bottom of the cutout or wear limit (2) is reached. For replacement, visit your Authorised Hero MotoCorp workshop.



#### BRAKES

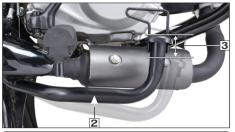
# (a) Brakes (Integrated braking system)

Brakes are items of personal safety and should always be maintained with proper adjustments.

When one applies the integrated/rear brake pedal, front & rear brakes activate jointly.



- (1) Front brake lever
- (3) Free play 10-20 mm



(2) Integrated/Rear brake pedal

(3) Free play 20-30 mm

The distance, the front brake lever (1) and integrated brake pedal (2) moves before each • After ensuring the gap, turn the second brake starts to engage is called free play (3).

# (b) Front brake cable (A) on "F" side Adjustment

- Push the integrated brake arm (4) by hand in the direction as shown.
- Turn the first adjuster nut (5) till you cannot turn it by hand.
- Check the free play of front brake lever.

### FREE PLAY: 10-20 mm

• If the free play is out specification turn the adjuster nut to obtain desired free play.



(i) Decrease free play (ii) Increase free play

- adjuster nut counterclockwise by half rotation.
- Check the free play of rear brake pedal.

### FREE PLAY: 20-30 mm

• If the free play is out specification turn the adjuster nut to obtain desired free play.

# (c) Integrated brake cable (B) on "C" side Adjustment

- Push the integrated brake arm (4) by hand in the direction as shown.
- Turn the second adjuster nut (6) until a gap is created between joint (7) and the slot on the first side in integrated brake arm.

# NOTE

"F" & "C" is marked on integrated brake arm.

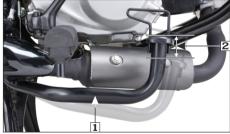


- (6) Second adjuster nut (7) Joint (i) Decrease free play

  - (ii) Increase free play

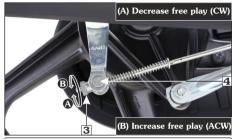
# (d) Rear brake inspection Adjustment

- Park the vehicle on its main stand.
- Measure the brake pedal (1) free play before the brake starts to take hold. Free play (2) should be 20-30 mm.



- (1) Rear brake pedal
- (2) Free play: 20-30 mm

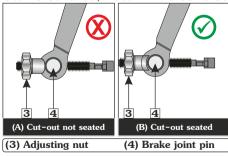
- If adjustment is necessary, turn the rear brake adjusting nut (3).
- Make sure that the cut-out on the adjusting nut is seated on the brake joint pin (4) after the final adjustment has been made.



(3) Adjusting nut

(4) Brake joint pin

# CW-Clockwise, ACW-Anticlockwise



 Apply the brake several times and check for free wheel rotation when released.

# NOTE

If proper adjustment cannot be obtained by this method, visit your Authorised Hero MotoCorp workshop.

## (e) Brake wear indicators

When the brake is applied, an arrow (1), fixed to the brake arm (2), moves towards a reference mark (3) on the brake panel (4). If the arrow aligns with the reference mark on full application of the brake, the brake shoes must be replaced.

#### Front brake wear indication



- (1) Arrow (3) Reference mark
- (2) Brake arm
- (4) Brake panel

#### Rear brake wear indication



- (1) Arrow (3) Reference mark
- (2) Brake arm (4) Brake panel

#### SUSPENSION

# Front and rear suspension inspection

 Check the front forks by locking the front brake and pumping the front fork up and down vigorously. The suspension action should be smooth and there should be no oil leakage.





• Check the rear shock absorber by pushing **WHFFI**. hard downwards on rear grip while the vehicle is not parked on stand. The suspension action should be smooth and there should be no oil leakage.

#### Rear shock absorber adjustment

Rear shock absorber adjustment can be made according to the load/road conditions.

- In direction A: Stiffer
- In direction B: Softer



(1) Rear shock absorber (A) Stiffer

(2) Pin spanner (B) Softer

# NOTE

Always adjust both the rear shock absorbers to the same position. To adjust the rear shock absorber (1), use the rear shock absorber adjustment tool (Pin spanner) (2) available in the tool kit.

# (a) Front wheel Removal

- Support the vehicle securely on the main stand and raise the front wheel off the ground.
- Remove the speedometer cable (1) by pressing the tab (2) & pulling cable out from the speedometer gearbox.
- Disconnect the front brake cable (3) and integrated brake cable (4) from the integrated brake arm (5) and brake panel (6) by removing the front brake adjusting nut (7) and integrated brake adjusting nut (8).



- (1) Speedometer cable (2) Tab
- (3) Front brake cable (4) Integrated brake cable (5) Brake arm (6) Brake panel
- (7) Front brake adjusting nut
- (8) Integrated brake adjusting nut
- (9) Axle nut (10) Axle (11) Side collar

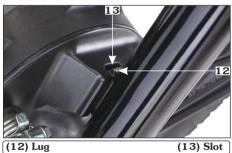
- Remove the axle nut (9).
- Remove the axle (10) and side collar (11).
- · Remove the wheel.

#### Installation

- Reverse the removal procedure.
- Install the front wheel by ensuring that the lug (12) on the left fork is located in the slot (13) in the brake panel.
- Tighten the axle nut.

# Axle nut torque: 5.4 kgf-m

- Adjust the front brake free play and integrated brake free play (page 40).
- After installing wheel, apply the brake several times and check for free wheel rotation when released.



# (b) Rear wheel Removal

• Support the vehicle securely on the main stand and raise the rear wheel off the (8) Axle nut ground.



- (1) Rear brake adjusting nut (2) Brake rod
- (3) Brake arm (4) Brake stopper arm
- (5) Brake panel (6) Split pin (7) Lock nut
- Remove the rear brake adjusting nut (1) and disconnect the brake rod (2) from the brake arm (3) by pushing down the brake pedal. Disconnect the brake stopper arm (4) from the brake panel (5) by removing split pin (6) and lock nut (7).



(8) Axle nut (9) Axle (10) Collar

- Remove the rear axle nut (8).
- Pull out the axle (9) and collar (10).
- · Remove the wheel.

#### Installation

- Reverse the removal procedure
   Axle nut torque: 5.4 kgf-m.
   Brake stopper arm nut torque:
   2.2 kgf-m
- Adjust the rear brake free play (page 41) and drive chain slackness (page 37).
- After installing the wheel, apply the brake several times and check for free wheel rotation when released.



Always replace used split pins with new ones.

#### MAIN/SIDE STAND LUBRICATION

- Park the vehicle on the level surface.
- Check the main/side stand return spring for damage or loss of tension.
- Check the main stand (1)/side stand (2) for freedom of movement.
- Clean and lubricate the side stand pivot bolt (3) and rear brake pedal/main stand pivot (4).
- Make sure the side/main stand is not bent.



(1) Main stand

(2) Side stand

(3) Side stand pivot bolt

(4) Rear brake pedal/Main stand pivot

#### **TYRES**

The tyres that are fitted on your vehicle are designed to match the performance capabilities of your vehicle and provide the best combination of handling, braking, durability and comfort. To safely operate your vehicle, the tyres must be of recommended type and size, in good condition with adequate tread, and correctly inflated.

The recommended tyres size is:

Front	2.75x18-4PR/42P
Rear	2.75x18-6PR/48P

# WARNING

- The imported tyre(s) if fitted without ISI mark: are in compliance of BIS standard and Central Motor Vehicle Rules 1989, as declared by the Tyre manufacturer.
- Always use the size and type of tyres recommended in this owner's manual.

# Air pressure

Properly inflated tyres provide the best performance. combination of handling, tread life, and riding comfort. Generally, under inflated tyres wear Inspection unevenly, adversely affect handling, and are Whenever you check the tyre pressure, vou more likely to fail from being overheated. Under inflated tyres can also cause wheel for wear, damage & foreign objects: damage in rocky terrain.



(1) Air pressure gauge

Over inflated tures make your vehicle ride more harshly, are more prone to damage from surface hazards and wear unevenly.

Make sure the valve stem caps are secure. If necessary, install a new cap.

The recommended "cold" tyre pressure are:

	Rider only	Rider and Pillion
Front	1.75 kgf/cm² (25 psi)	1.75 kgf/cm <sup>2</sup> (25 psi)
Rear	2.00 kgf/cm² (28 psi)	2.80 kgf/cm <sup>2</sup> (41 psi)

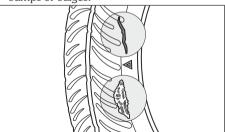
# **1** CAUTION

Over inflation/Under inflation will affect the

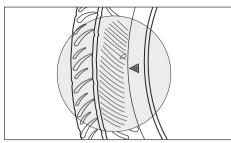
should also examine tyre treads & side walls

#### Look for:

• Bumps or bulges in the side of the tyre or the tread. Replace the tyre if you find any bumps or bulges.



- Cuts, splits or cracks in the tyre. Replace the ture if you can see fabric or cord.
- · Fxcessive tread wear



• Also, if you hit a pothole or hard object, pull to the side of the road as soon as you safely can and carefully inspect the tyres for damage.

#### Tread wear

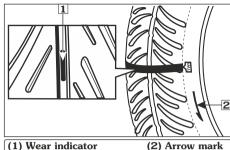
Replace tyres immediately when the wear indicator (1) appears on the tyre. The tread limits are:

#### MINIMUM TREAD DEPTH:

Front: 1.0 mm Rear: 1.0 mm Check the tread wear indicator (1) for tyre wear.

### Unidirectional tyres

Ensure the arrow mark (2) on the tyre is in the same direction as that of forward rotation of the wheel, whenever the tyre is removed and put back in case of puncture.



(1) Wear indicator

# **WARNING**

- · Using tyres that are excessively worn or improperly inflated can cause a crash in which you can be seriously hurt or killed.
- Operation with excessively worn tyres is hazardous and will adversely affect traction and handling.
- Follow all instruction in this owner's manual regarding tyre inflation and maintenance.
- Under-inflation may result in the tyre slipping on or tyre coming off the rim.

#### **NUTS. BOLTS & FASTENERS**

- Tighten bolts and nuts at regular interval shown in the maintenance schedule.
- Check that all chassis nuts and bolts are tightened to correct torque values.
- Check that all cotter pins, safety clips, hose clamps and cable stays are in place.



#### **BATTERY**

#### Location

The battery is located behind the right side cover.

# **Specification**

# \*MF Battery 12V-3 Ah/ETZ-3

It is not necessary to check the battery electrolyte level or add distilled water as the battery is a **Maintenance Free (sealed)** type. If your battery seems weak and electrolyte is leaking (causing hard starting or other electrical troubles), contact your Authorised Hero MotoCorp workshop.

\*MF stands for Maintenance Free

# NOTE



This symbol on the battery means that this product must not be treated as household waste.



This symbol on the battery means the old battery must be returned to your Authorised Hero MotoCorp workshop as it must be treated as recyclable material.

- Battery is a Maintenance-Free (sealed) type and can be permanently damaged if the sealing strip is removed.
- An improperly disposed battery can be harmful to the environment and human health. Always confirm local regulations for battery disposal.

# **Battery charging**

Always visit your Authorised Hero MotoCorp workshop if you see any symptom of battery discharge as earliest as possible to get the battery charged. The battery has a tendency to discharge rapidly if optional electrical accessories are fitted on the vehicle.

# **Battery storage**

- If in case your vehicle is not used for more than a month remove the battery, fully charge and store in a cool and dry place.
- If the battery is expected to be stored for more then two months, ensure to fully charge the battery once in a month.
- Always ensure the battery is fully charged before installation.

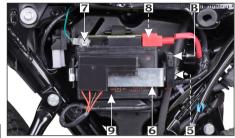
 Ensure the battery leads are properly connected to the battery terminals during installation.

#### **Battery removal**

- Make sure the ignition switch is "OFF" (♥).
- Remove the right side cover (1) by removing side cover bolt (2). Pull out lug (3) from the grommet and slide the cover as per direction indicator (4).



- (1) Right side cover (2) Side cover bolt (3) Lug (4) Direction indicator
- Remove the fuse box (B).
- Remove the battery clamp bolt (5) and the battery clamp (6).
- Disconnect the negative (-)ve terminal lead (7) from the battery first, then disconnect the positive (+)ve terminal lead (8).
- Pullout the battery (9) from the battery box.



(B) Fuse box

- (5) Bolt
- (6) Battery clamp (8) (+)ve terminal
- (7) (-)ve terminal (9) Battery

# **Battery installation**

- Reinstall in the reverse order of removal. Be sure to connect the positive (+)ve terminal first, then the negative (-)ve terminal.
- Check all fasteners are secured properly.

### **FUSE REPLACEMENT**

**Fuse box (A):** Mounted on the battery clamp (1).

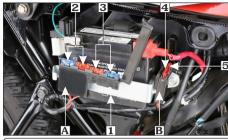
Fuse type: Blade fuse

Circuit fuse (2) : 15A, 10A Spare fuse (3) : 15A, 10A

Fuse box (B): Mounted on the battery

clamp (1).

**Fuse type:** Blade fuse Circuit fuse (4) : 10A Spare fuse (5) : 10A



(A) &(B) Fuse box

(1) Battery clamp

(2) Circuit fuse: 15A & 10A (3) Spare fuse: 15A & 10A

(4) Circuit fuse: 10A (5) Spare fuse: 10A

# / WARNING

- Never use a fuse with a different rating from that specified. It may lead to serious damage to the electrical system or a fire due to short circuit.
- Battery gives off explosive gases. Keep sparks, flames & cigarettes away.

### **GOOD FUSE**



# **BLOWN FUSE**

# CAUTION

- Do not attempt to start or ride the vehicle without a charged battery, it can cause fusing of the bulbs and permanent damage to certain electrical components.
- Turn the ignition switch "OFF" before checking or replacing the fuse to prevent accidental short-circuiting.

#### STOP LAMP SWITCH

The stop lamp switch (1) must be adjusted so that stop lamp will glow when rear brake is applied. Rear brake free play (page 41) should be adjusted before performing stop lamp switch adjustment. The procedure for adjusting stop lamp switch is as follows:

• Turn the ignition switch to the "ON" (O) position.



(1) Stop lamp switch

(2) Adjusting nut

(A) Advance (B) Retard

 Turn the adjusting nut (2) to position stop lamp switch at a point where the stop lamp will glow just before the brake pedal is depressed to the limit of its free play. Turn the adjusting nut in direction (A) to advance switch timing or in direction (B) to retard switch timing.

#### HEADLAMP FOCUS ADJUSTMENT

Headlamp is factory preset. However in case of adjustment required, please follow the steps as given below:

- Headlamp adjustment is done by the headlamp adjusting bolt (1) located below headlamp.
- Park the vehicle on level ground.
- Turn the ignition switch to "ON" position (Ω) and start the engine.



# (1) Headlamp adjusting bolt

 Adjust the headlamp beam vertically by loosening the bolt & move the headlamp unit forward & backward for correct focus adjustment.

# / WARNING

An improperly adjust headlamp may blind oncoming rider/driver or it may fail to light the road for a safe distance.

#### CATALYTIC CONVERTER

This vehicle is equipped with the catalytic converter (1) in the muffler to meet the emission norms.



### (1) Catalytic converter

metals that serve as catalysts, promoting chemical reactions to convert the exhaust gasses without affecting the metals. The catalytic converter acts on HC, CO and NOx. The catalytic converter must operate at a high temperature for the chemical reactions to take place. It can set on fire any combustible material that come near it. Park your vehicle away from high grasses, dry leaves, or other flammable material

The catalytic converter contains precious

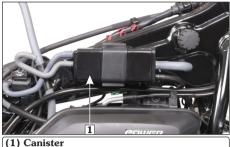
A defective catalytic converter contributes to air pollution and can impair your engine's performance.

Follow these guidelines to protect your vehicle's catalytic converter.

- Always use unleaded petrol. Even a small amount of leaded petrol can contaminate the catalyst metals, making the catalytic converter ineffective.
- Keep the engine in good running condition. A poorly running engine can cause the catalytic converter to overheat.
- If your engine is misfiring, backfiring, stalling, or otherwise not running properly, stop riding and turn "OFF" the engine. Have your vehicle serviced as soon as possible.

# **EVAPORATIVE EMISSION CONTROL** SYSTEM

This vehicle is equipped with an evaporative emission control system to meet emission standards. During warm weather, the petrol vapours which contain HC evaporates easily into the atmosphere from the fuel tank, if the fuel system is unsealed or open. The evaporative emission control system is used to prevent petrol vapours from escaping into the atmosphere from fuel tank. The canister (1) collects the fuel vapour from the fuel tank and then the fuel vapour is drawn into the engine for re-burning to avoid pollution caused by the fuel vapour diffused into the air.



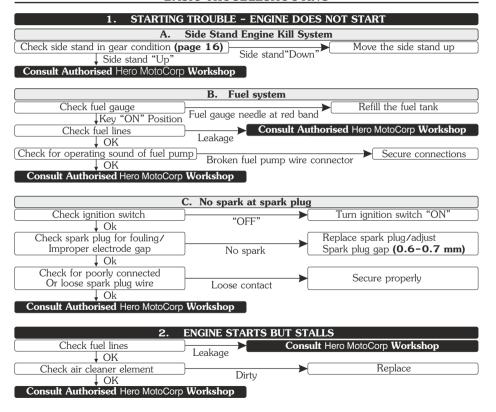
#### POLISHING OF VEHICLE

After washing your vehicle, wax all painted surfaces (except matte painted surfaces) using a commercially available polish/quality liquid or paste wax to finish the job. Use only a nonabrasive polish or wax made specifically for automobiles. Apply the polish or wax according to the instructions on the container.

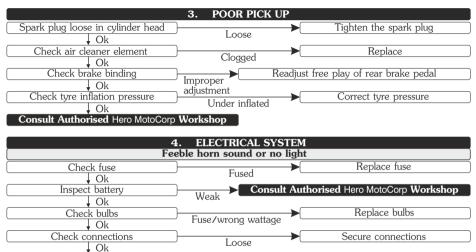
# NOTE

Polishing or waxing is not applicable for models having matte paint.

#### BASIC TROUBLESHOOTING



#### BASIC TROUBLESHOOTING



Consult Authorised Hero MotoCorp Workshop

# **ROAD SIGNS**



Mandatory signs: These road signs inform drivers/riders of the traffic rules that apply on a certain stretch of road, thereby instructing them on how to drive/ride. Mandatory signs are distinguished by the bright red circle with black and blue markings. It is imperative that all riders follow these signs as they help avoid accidents. Their violation can be penalised under the Motor Vehicle Act.

# Mandatory



Stop

Give Way































No Stopping or Standing



Length Limit

High Limit

Compulsory-Ahead Only











Track



Horn

Compulsory-Turn Left

Compulsory-Right Ahead

#### ROAD SIGNS

Cautionary signs: These signs inform the driver/rider of the road conditions ahead. Cautionary signs therefore serve as a warning. They are usually in a red triangle with black pictures on a white background. Illustrations, diagrams and symbols are used to forewarn about dangers ahead. Cautionary road signs are as important as mandatory signs. However, the violation of cautionary signs does not attract penalty.

#### Cautionary











Right Hand Curve



Right Reverse Bend

Gap in Medium

Incline Ahead



Men at Work

Roundabout



School Ahead



**Informatory signs:** These are facility signs that provide important information about road directions are maps of specific destinations. On highways, they provide information about the location of public telephones, restaurants, hospitals, parking, petrol pumps, resting-places and more. These signs are usually rectangular, with black or white pictures on a blue background.





















Hospital





















Place



Telephone

Place Identification Place











Bahadurgarh 10 Rohtak 48

Destination Sign

Light Refreshment

Taxi Stand

Parking Both Sides

Parking This Side

No Through Road

No Through Side Road

Re-assure Sign

Signs and Signals are language of the road. Learn them, respect them.



#### WARRANTY

# Scope of warranty

Hero MotoCorp Ltd. (hereinafter called 'Hero MotoCorp') warrants its **HF 100** vehicles, assembled/manufactured in its Plants and sold through its channel partners, to be free from any defect – both in material and workmanship, under normal use and conditions, subject to the following terms & conditions.

#### **Terms & conditions**

- a) HF100 vehicle is warranted for a period of 5 years or 70000 Km, whichever is earlier, from the date of purchase, emission warranty is separately covered under the head of "Emission Warranty".
- b) It is advised that the purchaser avails all free and paid services from the Hero MotoCorp's authorized workshop as per the recommended schedule, to be eligible for warranty benefits. Each paid service should be availed within 180 days from the date of previous service or as per the recommended schedule, whichever is earlier.
- c) If any problem is observed in **HF 100** vehicle, Hero MotoCorp's only obligation/liability is to repair or replace that part/those parts which is/are considered to be the cause of such problem, provided however that such problem has not resulted due to misuse/improper handling etc. of the vehicle. Any **HF 100** vehicle needing repair should be brought to Hero MotoCorp's authorized workshop for necessary inspection and carrying rectification job.



#### LIMITATIONS OF WARRANTY

#### The warranty shall not apply-

- (1) If all free services/paid services/oil top-ups are not availed as per the recommended schedule at Hero MotoCorp's workshop.
- (2) If any other engine oil which is non compatible with the product is used other than SAE 10W30 SL Grade (JASO MA2).
- (3) To normal wear & tear and ageing of components including (but not limited to) brake shoes/pads, clutch plates, drive chain & sprockets, bulbs, electrical wiring, filter, spark plug, fasteners, shims, washers, oil seals, gaskets, rubber parts, bush, rubber bellows, plastic parts breakage, wheel rim for misalignment/bend, steering ball race & cone, control cables such as brake cable/clutch cable, fuses (all types), steering handle for bend and sticker peel off.
- (4) If additional wheel(s) is/are fitted and/or any other modification carried out/unauthorized accessories fitted which shall be responsible for malfunction/deterioration of the vehicle or modifications/ alterations are made to the vehicle which are not permissible under applicable laws, or modifications, alterations, tampering or improper repair are undertaken at unauthorised workshops.
- (5) If any modifications/alterations/repairs are made to the vehicle which are (a) not as per applicable laws, and/or (b) are undertaken at unauthorized workshops.
- (6) If there has been any tampering or improper repair undertaken.
- (7) If HF 100 vehicle has been used in any competitive events like races or rallies or for any commercial purposes or if any damage results from misuse or use beyond the limitation of the intended purpose or any damage due to use under abnormal conditions.
- (8) To any damage on vehicle's painted surface cropping due to industrial pollution or other external factors.
- (9) For normal phenomena like noise, vibration, oil seepage etc., which do not affect the performance, quality and/or function, of the vehicle.
- (10) To any damage caused due to usage of improper oil/grease and/or non-genuine parts.
- (11) If any defect crops or repairs needed as a result of using adulterated fuel.
- (12) If any maintenance/repairs required due to bad road conditions or misuse of HF 100 vehicle or required due to operation or use of the vehicle at any place or for such purpose for which the vehicle is not designed or manufactured.
- (13) If any defect crops or repairs needed as a result of HF 100 vehicle meeting with some accident.
- (14) For consumables like oil, grease, gasket etc to be used during free services and/or warranty repairs.
- (15) If any damage results from repair, adjustment or maintenance operations by any method other than the methods specified by Hero MotoCorp.
- (16) If any damage results from operation, whether intentional or accidental, other than as specified in the Owner's Manual.
- (17) To electrical components such as bulbs, fuses, electrical wiring cut due to external reasons (Rat bites etc.).



- (18) Any cost for periodic maintenance such as cleaning, inspection and adjustment.
- (19) To any part of the HF 100 vehicle which has been tampered or repaired in such a manner which has resulted in malfunction of the vehicle.
- (20) For **HF 100** vehicle not used in accordance with the guidelines given in this Owner's Manual.
- (21) To proprietary items like tyres, tubes, batteries, etc, as they are subjected to the warranty terms & conditions of the respective manufacturers and directly handled by them only.
- (22) Any defect(s) developing on account of external factors such as environmental factors; including but not limited to fading/peeling/rusting of paint and/or stripes and/or plated parts, seat leather tearing & cracking, aluminum parts oxidation and cracking & discoloring of control switches etc. or any damage resulting from soot and smoke, use of chemical, bird droppings or damage by sea water, sea breeze or salt.
- (23) If any damage results from operation, whether intentional or accidental, other than as specified in the Owner's Manual.
- (24) If the odometer of HF 100 has been altered or tampered.
- (25) If the Vehicle's Identification Number (VIN) or Engine number has been altered or removed, or any circumstances exist that makes it difficult or impossible to establish the true history, origin and warranty coverage of the vehicle or part in question.
- (26) If any damage is caused due to a force majeure event, such as flood, fire, terrorist act, etc.

Hero MotoCorp shall not be liable for (a) any incidental, indirect or consequential damages/loss of any kind whatsoever, and (b) any delay in servicing beyond its control or the control of its authorised dealerships/workshops.

This warranty is only given by Hero MotoCorp and no employee, dealership, workshop or any other person is authorised to extend the warranty provided herein. Hero MotoCorp's obligation under this warranty shall be limited to repairing or replacing, free of cost, those parts of the vehicle which upon examination by the Hero MotoCorp may prove to the satisfaction of Hero MotoCorp to have a manufacturing defect.

Hero MotoCorp's obligation under this warranty shall be limited to repairing or replacing, free of cost, those parts of the vehicle which upon examination by Hero MotoCorp may prove to the satisfaction of Hero MotoCorp to have a manufacturing defect. Decision regarding warranty settlement shall be taken by Hero MotoCorp and the same shall be final and binding on all concern.

Subject to DELHI JURISDICTION only.



#### **BATTERY WARRANTY**

Battery fitted in **HF 100** is a proprietary product of the battery manufacturer and shall be fulfilled and handled directly by the battery manufacturer; Hero MotoCorp shall not be liable for the same. The battery warranty shall be for the period and governed by the terms and conditions as mentioned herein below:

#### Warranty Period:

The battery is warranted by the battery manufacturer for a period of 18 months from date of sale of vehicle or  $20000\,\mathrm{km}$  whichever is earlier.

#### Terms and conditions of warranty

- Batteries are warranted against all defects in material and workmanship. Liability under this warranty is limited to
  making good of defects rising solely from the use of faulty material or workmanship during manufacturing and
  developing under proper use.
  - The warranty commences from the date of delivery to the original purchaser of the vehicle.
- 2. In the event of any complaint the battery is to be returned complete with electrolyte to nearest battery service station or to the dealer. On inspection, battery will be returned or replaced.
- 3. This warranty card accompanies a battery sold as OEM fitment only. Claims should be supported with vehicle purchase invoice to enable processing.
- 4. The right to determine whether a battery needs repair or total replacement lies with the battery manufacturer. In case where the battery is replaced, the defective battery becomes the property of the company and no scrap rebate will be given for it. The warranty period on the battery being repaired/replaced shall commence from the date of sale of the original battery as stated in the original warranty card.
- 5. All liabilities under this warranty will cease if the battery is used on the vehicle other than that on which the battery was originally fitted and on the expiry of the warranty period as mentioned above.
- Recharging is not covered under the purview of this warranty and shall be billed as extra. However, free of cost (FOC) battery replacement/repair includes cost of charging.
- 7. This warranty does not cover damage to the battery caused by faulty electrical systems, incorrect charging and filling, improper handling of the battery by unauthorized dealers/auto electricians, maintenance, willful abuse, destruction by fire, collusion, theft or recharging.
- 8. Breakage of container and cover do not come under the purview of this warranty.
- 9. Adjudication and settlement of claim will take a couple of days as a battery has to be tested for the reported failure.
- ${\bf 10.}\, \text{In case of tampering of the original wiring circuit in any manner whatsoever.}$
- 11. If a battery which is not recommended is fitted on the vehicle then such battery will not carry any warranty.
- 12. The applicable taxes which is leviable on the battery under repair or replacement will be borne by you (the customer).
- 13. You (the customer) are deemed to have read, understood and agreed to these conditions at the time of purchase of the vehicle.



#### **EMISSION WARRANTY**

#### Scope of warranty

Hero MotoCorp Ltd. warrants all its vehicles, assembled/manufactured at its various Plants and sold through its channel partners, to comply with emission standards as specified in sub rule (2) of Rule 115 of Central Motor Vehicles Rules, 1989, subject to following terms & conditions.

#### **Terms & conditions**

- a) The emission warranty shall be applicable in India and shall remain valid for a period of 3 years or 30000 km, whichever occurs earlier, from the date of vehicle purchase.
- b) The parts, which are covered under emission warranty are fuel injector, fuel pump, throttle body, ignition coil, oxygen sensor and muffler ("Emission Related Component(s)").
- c) In case any defect is observed in any Emission-Related Component(s) which are covered under emission warranty, Hero MotoCorp's only obligation/liability shall be to repair and/or replace those part (s) which is/are considered to be the cause of non-compliance with the emission standards.
- d) The method (s) of examination to determine the warranty conditions of the Emission Related Component will be at the sole discretion of Hero MotoCorp and / or its channel partners / service center and result of such examination shall be final and binding. If on examination the warranty conditions of the Emission Related Component is / are not established, Hero MotoCorpwill have the right to charge all, or part of the cost of such examination / service charges to you in addition to the cost of the components.
- e) Hero MotoCorp shall have the sole discretion to decide to replace the defective Emission Related Component or the entire assembly or any other part required for such repair.
- f) The emission warranty shall be applicable only to those vehicles, which are being regularly maintained in accordance with the maintenance schedule provided in the Owner's Manual.
- g) You should follow the recommended parts replacement as per the maintenance schedule in order to avail the emission warranty.
- h) If any Emission Related Component is/are tampered and/or repaired by unauthorized person/ workshops etc, then the emission warranty shall stand cancelled.
- i) Any Emission Related Component suffering from wear and tear under the normal course of running shall not be covered under the emission warranty. Therefore, all such parts should be replaced by you from time to time, on payment basis, as per the maintenance schedule provided in Owner's Manual and dealer's advice



#### **EMISSION WARRANTY**

- j) It is recommended to avail the services as per the recommended schedule to be eligible for the emission warranty benefits. Please ensure that each paid service is availed within 180 days from the date of previous services or as per the recommended schedule, whichever is earlier.
- k) It is mandatory to obtain a PUC certificate from the authorised PUC center. In case of non-compliance with the emission standards please contact the channel partner/authorised workshop immediately along with the previous OK certificate, for the necessary rectification. The manufacturer or the dealer is not responsible for any penalty levied on you on account of non-compliance with the emission standards.
- Emission warranty shall not be applicable if
  - · The vehicle has been subjected to abnormal use, abuse, neglect and improper maintenance or has met with an accident.
  - The vehicle, or parts including the Emission Related Component(s) thereof, has been altered, tampered with or modified or replaced in an unauthorized manner.
  - The odometer is not functioning or the odometer and/or its reading has been changed/tampered with, so that the actual distance covered cannot be readily determined.
  - · The vehicle has been used for competitions, races, and rallies or for the purpose of establishing records.
  - If any damage results to the Emission Related Component(s) covered under from repair, adjustment or maintenance operations by any method other than the methods specified by Hero MotoCorp.
  - · If any damage results from operation, whether intentional or accidental, other than as specified in the Owner's Manual.
  - · Any cost for periodic maintenance such as cleaning, inspection and adjustment.
  - · If any damage is caused to the Emission Related Component(s) due to a force majeure event, such as flood, fire, terrorist act, etc.
- m) All decisions regarding emission warranty settlement shall be taken by Hero MotoCorp and shall be final binding on all concerned.

Subject to Delhi jurisdiction only.



# WHAT ARE THE BENEFITS OF HERO MOTOCOPP GENUINE SPARE PARTS?

- · Assures long life
- Ensures economy for a long time
- · Safety of vehicle and rider
- · Peace of mind
- Value for money
- · Assured quality

### CONSEQUENTIAL DAMAGES ON USING NON-GENUINE PARTS

Clutch plate	Material used is inferior     Damages other parts of clutch like, clutch center and outer clutch     Affects fuel efficiency     Poor acceleration
Cam chain kit	Poor performance     Reduced life
Gasket cylinder head	<ul> <li>Improper sealing</li> <li>Engine knocking</li> <li>Leads to leakage and smoky exhaust</li> <li>Higher emission level</li> </ul>



# CONSEQUENTIAL DAMAGES ON USING NON-GENUINE PARTS

Element air cleaner	Improper air filtration resulting in premature engine failure     Affects fuel efficiency     Poor engine performance
Spark plug	<ul> <li>Frequent stalling of engine</li> <li>Higher emission level</li> <li>Poor engine performance</li> <li>Affects fuel efficiency</li> </ul>
Brake pads/Shoes	<ul> <li>Poor braking efficiency</li> <li>Rider safety-an issue</li> <li>Discs/Drum wear out, resulting in subsequent repair cost</li> </ul>
Chain sprocket kit	Noisy operation     Failure of chain can cause fatal accident

## **ZONAL/REGIONAL/AREA OFFICES**

For any of your service related query/requirements you may contact the respective Zonal/Regional/Area Offices

#### CENTRAL ZONE

Hero MotoCorp Ltd., No. 208, 209, 210– 2nd floor, Ganpati Plaza, M.I. Road, Jaipur–302001, (Rajasthan). Tel: +91 141–2389031, 2389156, 2389252, E-mail: jaipur@heromotocorp.com

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