#### **FOREWORD**

Thank you for choosing CHANGAN. We are pleased to welcome you to the growing number of discriminating people who drive CHANGAN. The advanced engineering and high-quality construction of each CHANGAN we build is something of which we're very proud.

Your Owner's Manual will introduce you to the features and operation of your new CHANGAN. It is suggested that you read it carefully because the information it contains can contribute greatly to the satisfaction you receive from your new car.

The Owner's Manual is verified before being delivered for printing. However, for continuous development and improvement of the product and/or the Owner's Manual to meet customer's needs, we reserve the right to revise the Owner's Manual as necessary, without prior notice. Don't compare the configuration and performance of Owner's vehicle with contents of other manuals and claim for compensation based on the difference between these two.

CHANGAN Automobile Co., Ltd. reserves the right to interpret and owns the copyright of the Owner's Manual. Without written authorization of the Company, no part of the Owner's Manual shall be duplicated or stored in any text, including partial quotation or citation in other literatures.

The manufacturer also recommends that service and maintenance on your vehicle be performed by an authorized CHANGAN dealer.

Chongqing CHANGAN Automobile Co., Ltd.

May 2021

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#### **OWNER'S MANUAL**

- Operation
- Maintenance
- Specifications

All information in this Owner's Manual is current at the time of publication. However, CHANGAN reserves the right to make changes at any time so that our policy of continual product improvement may be carried out.

This manual applies to all models of this vehicle and includes descriptions and explanations of optional as well as standard equipment.

As a result, you may find material in this manual that does not apply to your specific vehicle.

#### **HOW TO USE THIS MANUAL**

We want to help you get the greatest possible driving pleasure you're your vehicle. Your Owner's Manual can assist you in many ways. We strongly recommend that you read the entire manual. In order to minimize the chance of death or injury, you must read the WARNING and CAUTION sections in the manual.

Illustrations complement the words in this manual to best explain how to enjoy your vehicle. By reading your manual, you will learn about features, important safety information, and driving tips under various road conditions. The general layout of the manual is provided in the Table of Contents.

Use the index when looking for a specific area or subject; it has an alphabetical listing of all information

in your manual.

Sections: This manual has eight chapters plus an index. Each section begins with a brief list of contents so you can tell at a glance if that section

has the information you want.

Your safety, and the safety of others, is very important. This Owner's Manual provides you with many safety precautions and operating procedures. This information alerts you to potential hazards that may hurt you or others, as well as damage to your Vehicle. Safety messages found on vehicle labels and in this manual describe these hazards and what to do to avoid or reduce the risks.

Warnings and instructions contained in this manual are for your safety.

Failure to follow safety warnings and instructions can lead to serious injury or death.

Throughout this manual DANGER, WARNING, CAUTION, NOTICE and the SAFETY ALERT SYMBOL will be used.



This is the safety alert symbol.

It is used to alert you to potential physical injury hazards. Obey all safety messages that follow this symbol to avoid possible injury or death. The safety alert symbol precedes the signal words DANGER, WARNING and CAUTION.

## CAUTION: MODIFICATIONS TO YOUR CHANGAN VEHICLE

Your CHANGAN should not be modified in any way. Such modifications may adversely affect the performance, safety or durability of your CHANGAN vehicle and may, in addition, violate conditions of the limited warranties covering the vehicle. Certain modifications may also be in violation of regulations established by the Department of Transportation and other government agencies in your country.

## TWO-WAY RADIO OR CELLULAR TELEPHONE INSTALLATION

Your vehicle is equipped with electronic fuel

injection and other electronic components. It is possible for an improperly installed/adjusted two-way radio or cellular telephone to adversely affect electronic systems. For this reason, we recommend that you carefully follow the radio manufacturer's instructions or consult your CHANGAN dealer for precautionary measures or special instructions if you choose to install one of these devices.

## SAFETY AND VEHICLE DAMAGE WARNING

This manual includes information titled as DANGER, WARNING, CAUTION and PROHIBIT. These titles indicate the following:



#### **DANGER**

DANGER indicates a hazardous situation which, if not avoided, will result in death or serious injury.



#### **WARNING**

WARNING indicates a hazardous situation which, if not avoided, could result in death or serious injury.

#### **CAUTION**

CAUTION indicates a hazardous situation which, if not avoided, could result in minor or moderate injury.



The safety mark shown in the picture above refers to "Prohibit...", "Prohibit doing..." or "The situation is prohibited".



The safety sign in the figure above indicates "high voltage DANGER, be careful of electric shock, please do not dismantle it for non-professionals".

#### **Accessories, Spare Parts and Refitting**

Don't refit the vehicles, for refitting may affect safety, controllability, performance and service life of vehicles, and may also violate laws and regulations. In addition, damage and performance problems caused by refitting are not covered by "Warranty".

To replace any part of the vehicle, always use spare and accessory parts manufactured by the supporting suppliers of the Company; otherwise, problems caused by using of improper parts are not covered by "Warranty".

#### Installation of Mobile Communication System

Installation of mobile two-way wireless communication system on the vehicle will affect the electrical systems, ABS, electronic stability program, hill-start assist control, SRS and seat belt pre-

tension system. Therefore, please consult a dealer authorized by CHANGAN Automobile related precautions and suggestions before the installation.

#### **PEPS System**

Owners of any electronic medical device (like a cardiac pacemaker) shall consult the device manufacturer for information about using such device under effect of radio wave, as radio wave may have unforeseeable effects on such kind of medical devices.

#### Tips for Highway Driving and off- road driving

As a utility vehicle which can run off road, the controllability and maneuverability of this vehicle are different from those of regular passenger vehicles, so are the ground clearance and the gravity center, larger and higher than the regular ones. The distinctive design features make it easier for these vehicle models to roll over than the regular passenger vehicles. Therefore, please read the sections "Precautions to Utility Vehicle" and "Precautions to Off-road driving" carefully for fear of accident and personal injury caused by vehicle out of control due to incorrect operation.

#### **Symbol Information**

The meanings of letters involved in the Owner's Manual are stated in the table below:

Symbol	Unit Referred	Symbol	Unit Referred	
L	L Liter		Kilometer/hour	
ml	Milliliter	kHz	Kilohertz	
km	Kilometer	kPa	Kilopascal	
m Meter		r/min	Rotation/minute	
cm	Centimete r	W	Watt	
mm	Millimeter	kw/r/min	Kilowatt/rotation/min ute	

min	Minute	°C	Celsius degree	
S	Second %		Percent	
kg	Kilogram	N∙m	Newton•meter	
A	Ampere	(°)	Degree	
V	Volt	(')	Arc minute	

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km	Kilometer	kPa	Kilopascal

m	Meter	r/min	Rotation/minute
cm	Centimeter	W	Watt
mm	Millimeter	kW/r/min	Kilowatt/ rotation/minute
min	Minute	°C	Celsius degree
s	Second	%	Percent
kg	Kilogram	N∙m	Newton•meter
А	Ampere	(°)	Degree
V	Volt	(′)	Arc minute

## **CONTENTS**

I. OVERVIEW OF VEHICLE	1
II. BRIEF INTRODUCTION	9
FUEL SPECIFICATION AND EMISSION LEVEL	10
	10
NAMEPLATE AND VEHICLE IDENTIFICATION NUMBER (VIN)	
MICROWAVE WINDOW ENGINE MODEL AND FACTORY NUMBER	
III. VEHICLE SAFETY SYSTEM	13
SEAT	14
SEAT BELT	17
SAFETY OF CHILDREN	
AIRBAG	25
IV. VEHICLE FUNCTION	34
KEY AND REMOTE CONTROLLER	35
PASSIVE ENTRY PASSIVE START PEPS SYSTEM X (IF EQUIPPED)	38
IMMOBILIZER	
Door Lock	
POWER WINDOW	
REARVIEW MIRROR	
SUNROOF **(IF EQUIPPED)	
TAIL DOOR	
ENGINE HOODFILLER CAP PLATE	
STEERING WHEEL	
Instrument Cluster	
INFORMATION DISPLAY	
LIGHT CONTROL	62
WIPER AND WASHER	
AIR CONDITIONING SYSTEM	
MULTIMEDIA SYSTEM	
PARKING ASSIST SYSTEM ※(IF EQUIPPED)	84

	87
PANORAMIC IMAGE SYSTEM **(IF EQUIPPED)	90
AUTOMATIC PARKING ASSIST (APA) X (IF EQUIPPED)	91
TIRE PRESSURE MONITORING SYSTEM (TPMS) X (IF EQUIPPED)	93
CRUISE CONTROL SYSTEM X (IF EQUIPPED)	95
ADAPTIVE CRUISE CONTROL (ACC) SYSTEM X (IF EQUIPPED)	96
INTEGRATED ADAPTIVE CRUISE CONTROL (IACC) %(IF EQUIPPED)	101
AUTOMATIC EMERGENCY BRAKING ASSISTANCE SYSTEM (AEB) X(IF	
EQUIPPED)	
PEDESTRIAN IDENTIFICATION ** (IF EQUIPPED)	
LANE DEPARTURE WARNING (LDW) SYSTEM X (IF EQUIPPED)	
THE SPEED LIMIT SIGN RECOGNITION ((TSR) X (IF EQUIPPED)	112
FAR/LOW BEAM) SYSTEM (FAB%(IF EQUIPPED)	
REAR WARNING ASSISTANT SYSTEM **(IF EQUIPPED)	
EXHAUST EMISSION CONTROL SYSTEM	
OTHER DEVICES	118
V. DRIVING VEHICLE	123
Precautions for SUV	
PRECAUTIONS FOR VEHICLE WITH SUPERCHARGED ENGINE	
PRECAUTIONS FOR DRIVING OFF-ROAD	
	404
Precautions Before Driving	
START AND STOP ENGINE	125
START AND STOP ENGINEPASSIVE START ※(IF EQUIPPED)	125 126
START AND STOP ENGINE	125 126 128
START AND STOP ENGINE  PASSIVE START ※(IF EQUIPPED)  SHIFTING  BRAKE	125 126 128 131
START AND STOP ENGINE	125 126 128 131
START AND STOP ENGINE  PASSIVE START ※(IF EQUIPPED)  SHIFTING  BRAKE	125 126 128 131 134
START AND STOP ENGINE  PASSIVE START **(IF EQUIPPED)	125 126 131 134 136 137
START AND STOP ENGINE PASSIVE START **(IF EQUIPPED) SHIFTING BRAKE IDLING START-STOP **(IF EQUIPPED) DRIVING ASSISTANCE DRIVING TIPS  VI. EMERGENCY	125126131134136137
START AND STOP ENGINE PASSIVE START **(IF EQUIPPED) SHIFTING BRAKE IDLING START-STOP **(IF EQUIPPED) DRIVING ASSISTANCE DRIVING TIPS	125126131134137140

## *CS55*

	PRECAUTIONS FOR MAINTENANCE AND REPAIR	149
	DRIVER INSPECTION LIST	149
	ENGINE OIL	150
	FUEL FILTER	
	REPLACEMENT OF ENGINE AIR FILTER ELEMENT	153
	MAINTENANCE OF BOOSTER	
	REPLACE AIR FILTER	
	ENGINE COOLANT	154
	Brake Fluid	
	WINDSHIELD CLEANING SOLUTION	156
	EXHAUST EMISSION CONTROL SYSTEM	156
	Battery	
	TIRE AND WHEEL	159
	FUSE	
	CLEANING OF VEHICLE BODY	
	MAINTENANCE OF VEHICLE PAINT	
	MAINTENANCE OF VEHICLE BODY ACCESSORIES	
	CORROSION PROTECTION	
	CLEANING INSIDE VEHICLE	
	FOG/FROST FORMATION ON LAMPS	165
	GPF MAINTENANCE	165
/	III. SPECIFICATIONS AND PARAMETERS	.166
	VEHICLE DIMENSIONS	167
	ENGINE	
	VEHICLE PERFORMANCE	
	WHEEL & TIRE SPECIFICATIONS AND INFLATION PRESSURE AT COLD STA	
	WHEEL ALIGNMENT (NO LOAD)	
	VEHICLE MASS	
	VEHICLE FUEL, OIL AND FLUID	
	LIST OF ABBREVIATIONS	174
/[		
•	I.REGULAR MAINTENANCE	.175
-		
1	TERMS AND CONDITIONS OF MAINTENANCE	176
		176 177

## I. OVERVIEW OF VEHICLE

## **CS55**

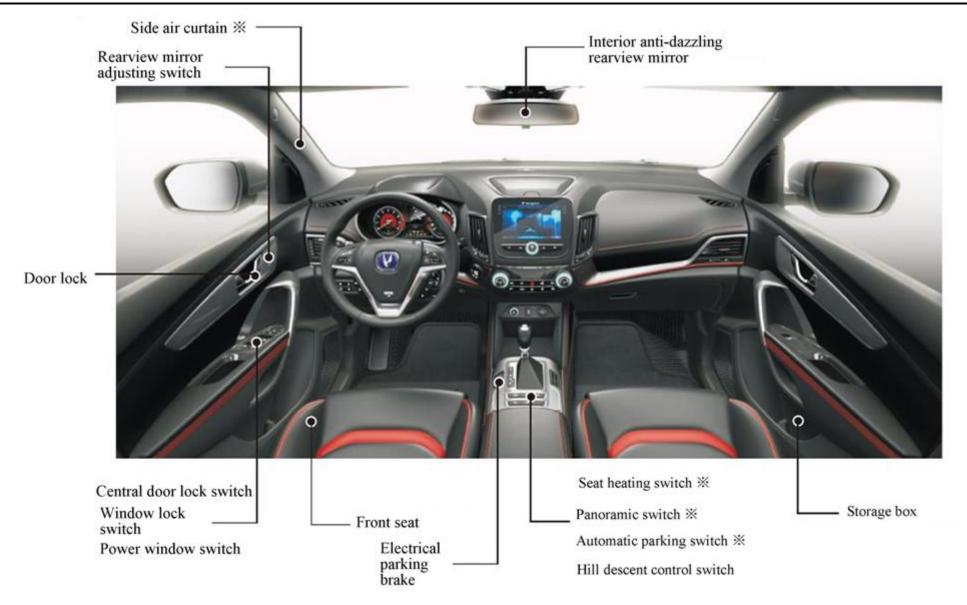
### **OVERVIEW**



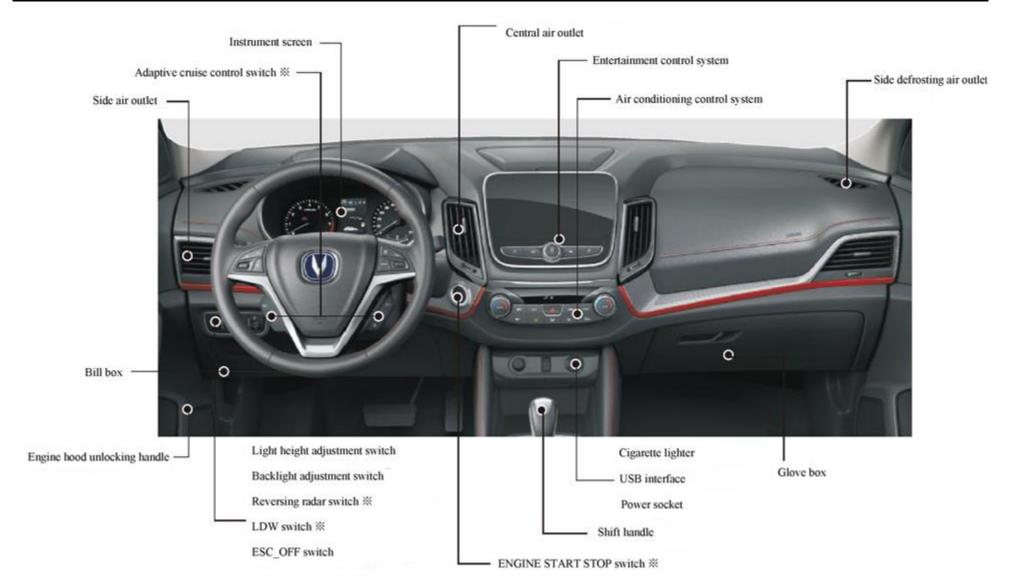
- ①Power window
- ② Rack raft
- ③Wiper
- 4 Engine hood
- ⑤Microwave radar※(if equipped)
- 6 High/low beam
- 7 Daytime running light
- **®Outside Rear-view mirror**



**X** This assembly is only equipped on some models, which is only for reference. The specific configuration is based on your vehicle.



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## **CS55**

#### Model 1%(if equipped) (if equipped)



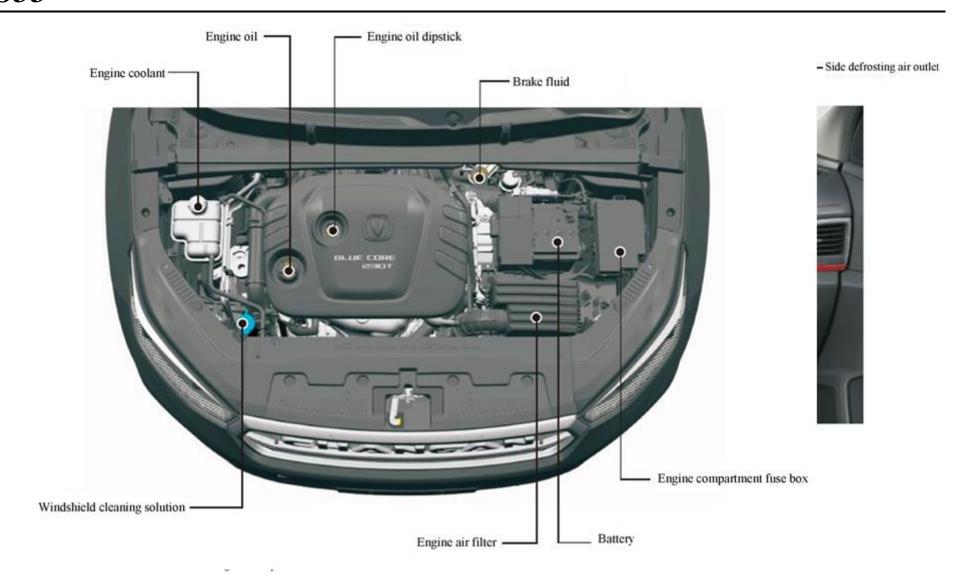
Model 2% (if equipped) (if equipped)



**X** This assembly is only equipped on some models, which is only for reference. The specific configuration is based on your vehicle.

<b>??</b>	Electronic Stability Control (ESC)	(C)	Electrical Parking Brake	ED	High Beam Lamp
Ş ⊙#	Electronic stability control OFI (ESP_OFF)	£	Engine Coolant Temperature		Low Fuel Level
<u>-0 0</u> =	Position Lamp	白	Charging of Battery		ABS
<b>○</b>	Rear Fog Lamp	المشكا	Oil Pressure		Engine Fault
A	Idling Start-Stop	4	Seat Belt	(!)	Tire Pressure Warning
B	Cruise	≣D	Low Beam lamp	EPS	EPS Indicator Lamp
2	Hill Descent Control	X	Airbag	File I	Immobilizer
		<b>(</b> ()	Brake System Fault		Electrical Parking Brake Fault

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## **II. BRIEF INTRODUCTION**

## FUEL SPECIFICATION AND EMISSION LEVEL

Exhaust gas emission of CS55 models meets requirements of Euro VI(b)

Only for Saudi Arabia region, unleaded gasoline with an octane rating of RON (Research Octane Number) 91# /AKI (Anti Knock) 89# or above must be used for the model.

**For other regions.** unleaded gasoline with an octane rating of RON (Research Octane Number) 92# / AKI (Anti Knock) 89# or above must be used for the model.

Only gasoline of the specified designation enables your new vehicle with the best performance and minimizes exhausted gas quantity and carbon deposit in spark plug.

#### CAUTION

NEVER USE LEADED FUEL. The use of leaded fuel is detrimental to the catalytic converter and will damage the engine control system's oxygen sensor and affect emission control.

Never add any fuel system cleaning agents to the fuel tank other than what has been specified (We recommend that you consult an authorized CHANGAN dealer for details.)

### À

#### **WARNING**

Do not "top off" after the nozzle automatically shuts off when refueling.

Always check that the fuel cap is installed securely to pre-vent fuel spillage in the event of an accident.

## Gasoline containing alcohol and methanol

Gasohol, a mixture of gasoline and ethanol (also known as grain alcohol), and gasoline or gasohol containing methanol (also known as wood alcohol) are being marketed along with or instead of leaded or unleaded gasoline.

Do not use gasohol containing more than 10% ethanol, and do not use gasoline or gasohol containing any methanol. Either of these fuels may cause drivability problems and dam-age to the fuel system, engine control system and emission control system.

Discontinue using gasohol of any kind if drivability problems occur.

Vehicle damage or drivability problems may not be covered by the manufacturer's warranty if they result from the use of:

- 1. Gasohol containing more than 10% ethanol.
- 2. Gasoline or gasohol containing methanol.
- 3. Leaded fuel or leaded gasohol.

#### **CAUTION**

Never use gasohol which contains methanol. Discontinue use of any gasohol product which impairs drivability.

#### Other fuels

Using fuel additives such as:

- Silicone fuel additive
- MMT (Manganese, Mn) fuel additive
- Ferrocene (iron-based) fuel additive
- Other metallic-based fuel additives may result in cylinder misfire, poor acceleration, engine stalling, dam-age to the catalyst, or abnormal corrosion, and may cause damage to the engine resulting in a reduction in the overall life of the powertrain.

#### **CAUTION**

Damage to the fuel system or performance problem caused by the use of these fuels may not be covered by your New Vehicle Limited Warranty.

#### **Use of MTBE**

Changan recommends avoiding fuels containing MTBE (Methyl Tertiary Butyl Ether) over 15.0% vol. (Oxygen Content 2.7% weight) in your vehicle.

Fuel containing MTBE over 15.0%vol. (Oxygen Content 2.7% weight) may reduce vehicle performance and produce vapor lock or hard starting.

#### **CAUTION**

Your New Vehicle Limited Warranty may not cover damage to the fuel system and any performance problems that are caused by the use of fuels containing methanol or fuels containing MTBE (Methyl Tertiary Butyl Ether) over 15.0% vol. (Oxygen Content 2.7% weight.)

#### Do not use methanol

Fuels containing methanol (wood alcohol) should not be used in your vehicle. This type of fuel can reduce vehicle performance and damage components of the fuel system, engine control system and emission control system.

#### **Operation in foreign countries**

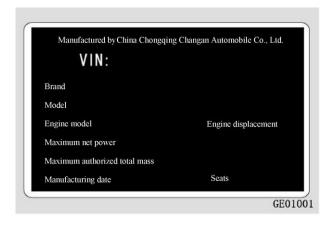
If you are going to drive your vehicle in another country, be sure to:

- Observe all regulations regarding registration and insurance.
- Determine that acceptable fuel is available

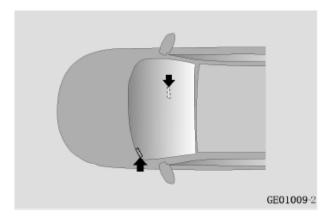
# NAMEPLATE AND VEHICLE IDENTIFICATION NUMBER (VIN)

#### **Nameplate**

The nameplate is set below right rear door frame lock catch, stating information like vehicle identification number and maximum authorized total mass.



#### **Vehicle Identification Number**



VIN stamping position:

Metal panel of front wall inside glove box

VIN attaching position:

Junction of the instrument panel and the windshield Nameplate

## How to read out vehicle identification number from ECU:

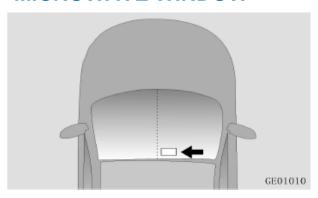
- 1. Connect a general diagnostic scanner to the OBD diagnostic interface at the left lower part of the console:
- 2. Select current vehicle model in the interface of diagnostic scanner, and enter engine EMS system;
- 3. Choose "Read Version Information" option in EMS interface to check VIN.

OBD interface supports most general automobile diagnostic scanners available in the market. The scanner used by dealer authorized by Changan Automobile is Bosch KT710.

#### **CAUTION**

- OBD diagnostic interface of Changan vehicles supports either CAN communication or K-line communication. Please try a general diagnostic canner supporting CAN communication first. If it does not communicate with EMS, try another one supporting K-line communication;
- If both scanners fail to establish communication with EMS, or fail to read out VIN, please contact a dealer authorized by Changan Automobile.

#### **MICROWAVE WINDOW**



Microwave window is on the right upper part of the front windshield. It shall not be covered by the supports of rain sensor or lane departure sensor.

## **CS55**

# **ENGINE MODEL AND FACTORY NUMBER**

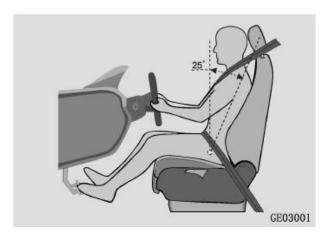


Both the engine model and the factory number are stamped on the engine cylinder block.

## **III. VEHICLE SAFETY SYSTEM**

#### **SEAT**

#### **Seat Position**



Preset seat position and backrest angle (for measuring of seat cushion thickness) of this vehicle model:

- Designed adjusting capacity of seat: The seat can slide forward for 10 mm from the backmost position.
- Designed backrest angle: With a dummy in the seat, it refers to the angle between the dummy's trunk line and the vertical direction, which is designed to be 25° for this model.

#### **Correct Sitting Posture**

Uttermost protection can be gotten in case of vehicle collision only when the seat, headrest, seat belt and airbag are correctly used. When the vehicle is running, we suggest you to:

- Adjust seat position correctly to ensure that the seat and backrest are locked at proper positions. Please do not tilt the backrest excessively.
- Adjust the headrest's height to make its center be aligned to the upper part of ear. Upon adjustment, make sure the headrest is locked at a desired position.
- The driver shall keep an enough safe distance from the steering wheel and incline the steering wheel downward as far as possible to keep the airbag directly facing the driver's chest.
- Adjust to a correct sitting posture to sit up right as much as possible with back leaning against the backrest.
- The seat belt shall be properly fastened (see "Seat Belt Wearing" section).

#### A

#### **DANGER**

Do not drive the vehicle before passengers sit properly.

Passengers are not allowed to sit on the backrest of a folded seat, or in the trunk or on cargo.

Passengers are not allowed to stand or move among seats while the vehicle is running for fear of injury or death caused by emergency braking or vehicle collision.

Do not put anything unevenly weighed or sharp (like needles or nails) on the seat.

For seat equipped with a side airbag, do not refit or replace it or its cover; otherwise the normal activation of side airbag may be affected or the airbag may deploy accidentally, resulting in injury.

In case of emergency braking or vehicle collision, injuries may be caused to passengers with improper sitting posture or unfastened seat belt.



#### **DANGER**

Do not put hands under the seat or near any movable part when adjust the seat for fear of being pinched and injured.

Excessive inclination of backrest is forbidden. If the driver or the passenger lean against the seat aslant, the waist belt may directly apply pressure to the belly, or the shoulder belt will contact the neck, causing severe injuries in case of vehicle collision.

Great energy will be generated at the moment of airbag deployment. Incorrect wearing of seat belt or improper sitting posture may cause injury to the head, neck and other vulnerable body parts of the occupants in vehicle, and such injury may be deadly especially for children.



#### **DANGER**

It is forbidden to adjust the seat when the vehicle is running, as it may cause vehicle out of control or personal injuries due to accidental movement of seat.

Do not place any article under the seat as it may hinder seat adjustment, or affect the seat locking mechanism, or push the seat position adjusting lever accidentally, causing sudden movement of the seat and vehicle out of control.



#### **WARNING**

It is not recommended to add any pad on the seat surface. Improper size, shape or layout of the pad added on the seat surface may cause malfunction of the front seat SBR (seat belt reminder).

# Front Seat Adjustment (Manually-adjusted Seat) %(if equipped)



#### 1. Seat Position Adjusting Lever

Hold the middle part of the adjusting lever (Item 1), and pull it upward, and then slightly lean against the seat and slide it to the desired position. Release the adjusting lever.

#### 2. Seat Height Adjusting Handle

Pull up or push down the adjusting handle (Item 2).

#### 3. Backrest Angle Adjusting Handle

Pull up the backrest angle adjusting handle (Item 3), and lean slightly against the backrest backward to adjust it to a desired angle, and then release the handle.

## Front Seat Adjustment (Power Seat) \*\*(if equipped)



#### 1. Switch of Seat Position and Height

Move the control switch (Item 1) along the desired direction, and release the switch; then, the seat is stopped and locked.

#### 2. Angle Adjustment Switch of Backrest

Rotate and move the control switch (Item 2) along the desired direction, and release the switch; then, the backrest is stopped and locked.

#### 3. Limber Support Adjustment Button

Press the front end of the limber support adjustment button (Item 3), and the limber support extrudes forward; press the rear end of the limber support adjustment button (Item 3), the support moves backward. Release the button when the support reaches the desired position.

#### **Seat Heating %(if equipped)**



Both the driver's seat and the front passenger's seat are provided with heating switch.

Press the heating switch once, two indicator lamps light up, and the heating function of the seat is activated at "high" position;

Press the heating switch twice, one indicator lamp lights up, and the heating function of the seat is activated at "low" position;

Press the heating switch for three times, indicator lamp(s) goes out and the heating function is inactivated.

#### **DANGER**

It is possible to cause overheating or burning while using seat heading function. Always be cautious especially for long-time functioning. Please operate the heating switch for adjustment based on actual situation. The following occupants shall pay special attention while using the heating function:

• The old, infants, children, patients, the disabled and pregnant women;

- Skin-sensitive persons;
- Excessively tired people, drunk people or any one sleepy due to drug effect (like sleeping pill or cold medication).

#### WARNING

Do not cover the seat with blanket, cushion or other thermal insulation articles while the heating function is on.

#### **Headrest Adjustment**



Raise: Lift it upwards.

Lower: Press the locking release button (Item ①) while push down the headrest.

Remove: Press the locking release buttons (Item 1 and Item 2) while lift the headrest upwards to remove it.

#### DANGER

Never adjust the headrest when the vehicle is running.

The headrest's protection effect will be better when

it is close to the head. Therefore, do not put cushion on the backrest.

Do not drive a vehicle without headrests.

When there is no passenger in the rear seat, adjust the headrest of the seat to the lowest position to avoid hindering the vision to the rear area.

To install a forward-facing child restraint system on rear seats, please lift or remove the headrest if it interferes with normal function of the system.

#### **Adjustment of Rear Seats**



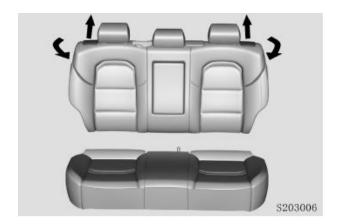
Lift up the backrest unlock lever. Adjust the backrest to desired angle (two positions available), and then release the unlock lever.

#### DANGER

If there is a passenger on central position of the rear seat, adjust the backrest of seat in 4:6 proportion to the same angle.

#### **Expansion of Trunk Space**

Turn the cushion over to vertical position, pull the backrest unlock lever upwards to unlock and turn the backrest forward, so as to expand the space.



#### Middle Hand Rail of Rear Seat



Pull down the middle hand rail of the rear seat for use.

#### DANGER

To reduce possibility of personal injuries in case of an accident or emergency braking, the armrest shall be kept closed when it is not used.

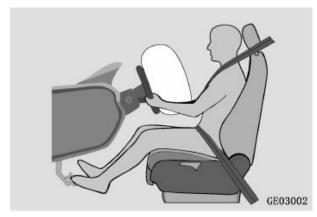
#### **SEAT BELT**

A large inertia force will be produced in case of vehicle collision or emergency braking. Seat belts are the most basic and effective safety protection devices.

Seat belts can restrain the driver and passengers to the seats and effectively protect the driver and passengers from impacting internal components of the vehicle. It also absorbs a large amount of kinetic energy, reducing injuries to the driver and passengers.

Wearing seat belts correctly is an important precondition for the airbags exerting protective effects.

Wearing seat belts incorrectly or sitting in wrong posture may cause injuries to the head, neck and other vulnerable body parts of the occupants due to the great energy produced at the moment of airbag deployment.



To maximize protection of seat belt, before driving, we suggest you to:

- Wear the seat belt correctly;
- Adjust the seat, and sit in correct posture.

#### **M** DANGER

Check seat belt parts regularly, and replace any damaged or malfunctioned seat belt.

One seat belt is only for use by one occupant.

After accidents, replace the used and deformed seat belts.

It is forbidden to refit or remove the seat belt in any way without authorization. If repair or replacement is necessary, please contact a dealer authorized by Changan Automobile!

#### **CAUTION**

Do not pinch or twist the seat belt while wearing it; Do not have the seat belt contacting anything sharp or vulnerable while wearing it;

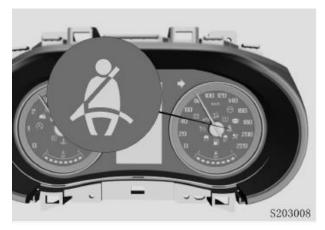
The function of seat belt may be hindered by excessively loose outfit (such as an overcoat outside men's casual wearing);

The seat belt must be clean, for the dirty belt will hinder the function of automatic retracting device;

The buckle shall not be blocked by paper or similar objects; otherwise the latch and the buckle cannot engage with each other.

#### **Seat Belt Reminder**

The seat belt indicator lamp on the instrument panel reminds the driver and front passenger to wear seat belts;



When the vehicle is running, the seat belt indicator lamp keeps being on and gives warning tone if either the driver or the front passenger does not wear seat belts.

If either the driver or the front passenger still does not wear the seat belt, the warning tone will be off about 5 min later.

#### **CAUTION**

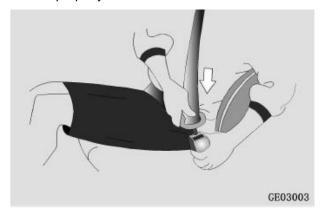
If the seat belt reminder does not work under the afore mentioned logic, it indicates fault of the device. Please contact a dealer authorized by Changan Automobile.

#### **Seat Belt Wearing**

Three-point waist seat belt shall be worn as low as possible to the crotch, not to the waist; the shoulder belt shall go across the body and in front of the occupant's chest, not under the arm.

#### Wearing

- 1. Pull the latch to pull out the seat belt smoothly;
- 2. Put the shoulder belt across the shoulder and the waist belt across the crotch;
- 3. Plug the latch into the buckle of the seat belt until there is a "click", indicating that the seat belt is latched properly.



#### Unlocking

Press the red button on the buckle.



#### **Wearing by Child**

The seat belts of this model are designed for adults. It is recommended to use child restraint system meeting national safety standards for children under 12 (please see "Child Safety" section).

If the child is too big to use the child restraint system, he/she shall always sit on the rear seat and use seat belt.

#### **Wearing by Pregnant Woman**

Put the waist belt across the crotch in a comfortable way.

Put the shoulder belt across the chest and then to the side of belly.



#### **DANGER**

Please use the seat belt correctly to ensure the safety of the pregnant woman and her baby. Consult a doctor for precautions before wearing the seat belt.

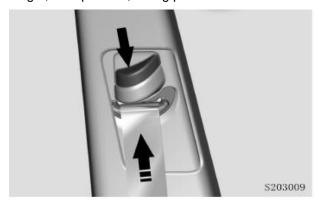
#### **Wearing by Injured People**

Please follow the doctor's advices and use the seat belt properly based on actual situation.

#### **Seat Belt for Front Seat**

#### **Adjustment of Upper Fixing Point**

The upper fixing point of seat belt can be adjusted upward and downward (by pressing the height adjuster button) to three available positions from the top to the bottom, and it can be adjusted to a more comfortable position based on the sitting height, seat position, sitting posture.



#### A

#### **DANGER**

A driver shall never adjust the seat belt during driving.

#### **Force Limit of Seat Belt**

Seat belt retractors for front seats are capable of force limiting.

In case of head-on collision of enough strength, the retractor will release a certain length of braid to reduce the squeezing of the braid on the chest when the tension of the chest braid exceeds set value.

#### **Seat Belt Pre-tensioner %(if equipped)**

The seat belt for the front seat is provided with pretensioner which functions even when the front seat is empty.

In case of head-on collision with enough strength, the pre-tensioner will be triggered, and the seat belt braid will be withdrawn automatically.

Make sure that the seat belt secures the front passenger's body, providing the maximum protection.

When the seat belt pre-tensioner works, it may make loud working noise and even smoke and dust, which are normal and not noxious. However, such smoke and dust may cause skin allergy or difficulty in breathing. If so, please keep ventilation and clean exposed skin thoroughly.

#### A

#### **DANGER**

The vehicle must be sent to a dealer authorized by Changan Automobile to replace the seat belts if the pre-tensioner has ever deployed or the vehicle has been used for ten years.

It is suggested to have all maintenance and detection of pre-tensioner done by a dealer authorized by Changan Automobile.

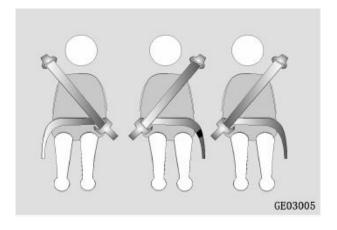
It is strictly forbidden to refit or remove SRS, or to

knock the airbag controller and sensor, or to damage the control circuit of SRS; otherwise, sudden functioning or malfunction of the pretensioner will be caused.

It is forbidden to refit, remove, knock or open components of the pre-tensioner, or to remove or damage the connection; otherwise, sudden functioning or malfunction of the pre-tensioner will be probably caused.

#### **Seat Belt for Rear Seat**

The rear seat is provided with three-point seat belt, of which the latch is concealed in the groove of rear seat cushion. To use the belt, take out the latch and insert it in.



#### SAFETY OF CHILDREN

#### **Correct Child Seat**

Children under 12 or 150 cm must sit on rear seats with child restraint system. If a child is too big for the child restraint system, he/she shall wear the seat belt for protection.

Do not leave a child alone in the vehicle for he/she may:

#### **DANGER**

Do not leave a child alone in the vehicle, not even for a very short time.

It is forbidden to embrace or hold an infant on one's thigh when the vehicle is running.

It is forbidden for a passenger to share one seat belt with an infant, or for two or more children share one seat belt.

Check the seat belt every now and then, as belt may deviate from correct position when the child moves.

- Open a door, endangering other people or other road owners;
- Get off the vehicle, interfering traffic or hurting himself/herself:
- Operate the vehicle, causing risk of accidents and injuries.

In addition, an airtight vehicle will become very hot and may cause serious injuries or even death to the child if he/she to get off the vehicle. The child may suffer other kinds of injuries due to other people getting into the vehicle.



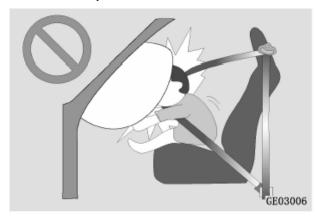
#### **Child Restraint System**

We strongly recommend you to use a child restraint system that meets national safety standards.

To select and purchase an appropriate child restraint system, the child's height, age and weight shall be taken into consideration.

Please install and use the child restraint system strictly according to the manufacturer's instructions.

Severe injuries or even death may be caused to the child if the child restraint system is installed and used incorrectly.



Do not use rear-facing child restraint device on the seat which is protected by front airbag (under activation state).





DO NOT place rear-facing child seat on this seat with airbag.

DEATH OR SERIOUS INJURY can occur.

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When the child restraint device will not be used any more, please use its fixing points or seat belt to securely fix it, or remove it from the vehicle.

If the safety system or other fixing devices are damaged in accident or overloaded, please contact a dealer authorized by Changan Automobile for inspection or replacement.

#### **DANGER**

The child restraint system can only be installed on the outer seats in the rear row. It is prohibited to install it on the front passenger's seat.

The backrests of rear seats shall be locked before installation of child restraint system.

After the child restraint system is installed, shake the system forward and backward, leftward and rightward to check whether it is securely fixed.

Displacement of the child restraint system shall not exceed 25 mm.

Before each time of use, make sure the child restraint system is securely fixed.

As for a child restraint system fixed with three-point type seat belt, make sure that the seat belt gets through the system without twisting and the latch is plugged into the buckle.



buckle before use.

#### **DANGER**

A child seat suitable for child's figure and weight must be used.

The ISOFIX fixing device of seat is only used for ISOFIX child seat.

Do not connect any fastening belt, non-ISOFIX child seat or any other article to the ISOFIX fixing device.

The fixing position and fixing method of the child seat must be chosen according to content specified in Table A.1 and A.2.

#### **ISOFIX Label Position**

ISOFIX is a standard fixing device used to install the child restraint system on the rear seats.

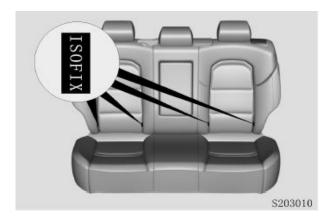
The fixing points for child restraint system meeting ISOFIX specifications have already been installed on the backrest of a rear seat. ISOFIX label can help you find the fixing points of the child restraint system quickly.



#### **DANGER**

It is forbidden to add cushion or other articles under or behind the child restraint system.

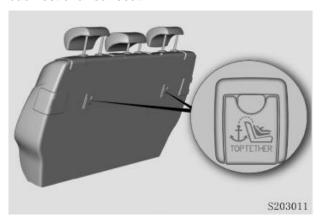
If the child restraint system is directly exposed to sunlight, the temperature of the seat belt and child restraint system may raise, causing burn to the child. Check the temperature of the seat cover and



#### **Position of ISOFIX Fixing Point**

#### **Upper ISOFIX Fixing Point**

The upper fixing point is located on backside of the backrest of a rear seat.



#### **Lower ISOFIX Fixing Point**

The lower fixing points are located at the junction between the rear seat cushion and backrest, being fixed on the backrest.



#### A

#### **DANGER**

It is forbidden to fix more than one child restraint system to a single fixing point, as the improperly added load may cause fracture of the fixing point, resulting in severe injuries or even death to the child.



#### **WARNING**

The child restraint system must be completely fixed on the vehicle seat, and it may be necessary to lift or remove the headrest.

When the child restraint system is fixed on the upper fixing point with a strap, the strap shall go through between the two ducts of the headrest.

Before installing the child restraint system, check whether there is any barrier in the ISOFIX fixing point area.

ISOFIX fixing points are designed only to bear the load generated by a correct and proper child restraint system. It is forbidden to use them to fix the seat belts, drawstrings or other attached objects or devices to the vehicle.

### **Applicability of Child Restraint System**

Table A.1 Applicability of Child Restraint System to Different Sitting Positions

Mana graup	Sitting position (or other positions)				
Mass group	Front seat passenger	Outer side of rear row	Middle of rear row		
Group 0 (less than 10 kg)	X	U/L	X		
Group 0+ (less than 13 kg)	X	U/L	X		
Group I (9 kg to 18 kg)	X	U/L	X		
Group II (15 kg to 25 kg)	X	U/L	X		
Group III (22 kg to 36 kg)	X	U/L	X		

Meaning of letters in the table:

U: It applies to general child restraint system approved for the mass group;

OUF: It applies to general forward-facing child restraint system approved for the mass group;

L: It applies to special child restraint system in the list. Such restraint systems may be special, restricted or semi-general;

B: It applies to integrated child restraint system approved for the mass group;

X: The seat does not apply to the child restraint system for the mass group.

Table A.2 Adaptability of ISOFIX Child Restraint System in Different ISOFIX Positions

Managaraya	Cina antonomi	Civin a mandula	ISOFIX position on vehicle		
Mass group	Size category	Fixing module	Front seat passenger	Outer side of rear row	Middle of rear row
	F	ISO/L1	X	IL	Х
Portable bed	G	ISO/L2	X	IL	Х
		(1)	X	X	X
Croup O (loss than 10 kg)	Е	ISO/R1	X	IL	X
Group 0 (less than 10 kg)		(1)	X	X	Х
	Е	ISO/R1	X	IL	X
Croup O. (loss than 12 kg)	D	ISO/R2	X	IL	Х
Group 0+ (less than 13 kg)	С	ISO/R3	X	IL	Х
		(1)	X	X	Х
	D	ISO/R2	X	IL	Х
	С	ISO/R3	X	IL	Х
Crown I (O km to 40 km)	В	ISO/F2	X	X	Х
Group I (9 kg to 18 kg)	B1	ISO/F2X	X	X	Х
	Α	ISO/F3	X	X	Х
		(1)	X	Х	Х
Group II (15 kg to 25 kg)		(1)	X	Х	Х
Group III (22 kg to 36 kg)		(1)	X	Х	Х

<sup>(1)</sup> As for child restraint system not marked (A~G) as per ISO/XX size category, the vehicle manufacturer shall, based on the applicable mass group, specify the special ISOFIX child restraint system recommended for each sitting position.

Meaning of letters in the table above:

IUF: It applies to general forward-facing ISOFIX child restraint system approved for the mass group;

IL: It applies to special ISOFIX child restraint system in the list. Such restraint systems may be special, restricted or semi-general;

X: The ISOFIX position does not apply to the ISOFIX child restraint system of the mass group and/or the size category.

#### **Child Safety Lock**

The child safety lock on the rear side doors can lock the rear side doors separately. When the lock is applied, the rear side doors cannot be opened from inside, and can only be opened from outside.



Activate: Turn the child safety lock on the rear side door to locking position  $\square$ .

Upon activation, make sure the child safety lock functions right.

Inactivate: Turn the child safety lock on the rear side door to unlocking position.

#### A

#### **DANGER**

The child safety lock shall be activated if there is a child in the vehicle. Otherwise, the child may open the door, causing injuries to himself/herself or other people.

#### **AIRBAG**

Airbag is a part of supplemental restraint system (SRS).

SRS is only a supplementary protection for the seat belt system and cannot take the place of the seat belt. Always wear and fasten the seat belt whenever the vehicle is running, and adjust the seat position and sit in proper posture (refer to "Seat" section).

The airbag deploys and forms a buffer between the occupant and the interior trim in case of severe vehicle collision, so as to reduce injuries to the occupant.

#### A

#### **DANGER**

The airbag is specially configured for this vehicle model. It cannot be replaced by other products; otherwise, system failure will be caused.

After airbag deployment or 10 years upon operation of the vehicle, the SRS must be replaced to ensure normal function of the system.

It is forbidden to remove, refit or damage SRS and relevant components, as such approach may cause system failure or malfunction of SRS, and the expected protection to the occupant cannot be achieved. It is also possible to result in malfunction or accidental deployment in case of an accident, causing severe casualties!

For any fault of SRS, please contact a dealer authorized by Changan Automobile for overhaul. Do not inspect or repair the system by yourself for fear of accidental injury!

#### A

#### **DANGER**

Airbag icon is set at every place where the airbag is installed. Please do not attach or place any object in such area.

No person, pet or other article is allowed between the occupant and the airbag.

Do not smoke while driving (for risk of burning in case of airbag deployment).

Children of or under age 12 shall sit on rear seats with child restraint systems.

#### **SRS Operation**

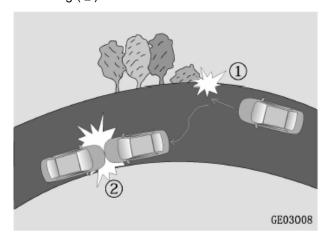
SRS only functions when the vehicle power is ON (airbag deploys if necessary).

The SRS indicator lamp must be in normal state (refer to "Instrument Cluster" section).

No positive connection exists between airbag deployment and vehicle body damage extent, and vehicle collision is not the precondition for airbag deployment. In other words, the airbag may not necessarily deploy under any collision conditions, and it deploys as per a series of factors which include but not limited to vehicle speed at collision, collision angle and entire deceleration generated during vehicle collision.

If the vehicle collides with deformable or movable objects (such as guard bar and tree) that can absorb impact force, the deployment speed of airbag is bigger than that when the vehicle collides with a solid and non-deformable object.

If the driver applies emergency braking at the time of collision, the impact strength at the moment of collision may be less than the standard activating strength of the airbag, so the airbag may not deploy. In case of continuous vehicle collision, the airbag will only deploy at the first time when the deployment conditions are met. If continuous collisions happen to the vehicle, the airbag may not be deployed when the impact strength is relatively small in slight collision (①), while in follow-up serious collision, the airbag may work when the impact strength reaches deployment standard of the airbag (②).



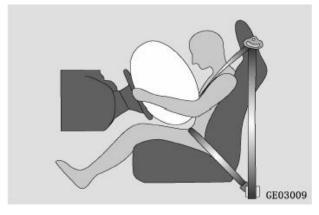
#### **DANGER**

Please make sure SRS functions right. If the indicator lamp is faulted, please send the vehicle to a dealer authorized by Changan Automobile for repair immediately; otherwise the airbag may fail to deploy at vehicle collision, which may result in accident or damage.

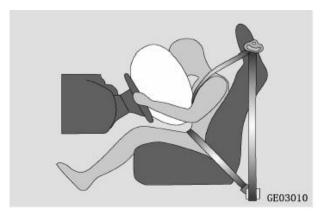
Immediately contact a dealer authorized by d Automobile for inspection on airbag controller in case the vehicle runs in water or the passenger compartment is soaked in water, so as to avoid the malfunction of airbag, which may result in accident and personal injury due to accidental deployment or deployment failure of airbag.

#### **SRS Working Process**

- 1. In case of vehicle collision, the sensor detects that impact strength exceeds a certain extent, and sends signal to airbag controller which determines to deploy or not;
- 2. After receiving deployment signal from the controller, the airbag expands and deploys, forming a buffer between the occupant and the trim pieces;



3. The airbag absorbs impact strength, and the seat belt protects the occupant's head and upper body, so as to reduce injuries to the occupant.



4. The airbag deflates rapidly to relieve impact to the occupant.

#### **DANGER**

The airbag will make a relatively loud noise and releases smoke when it deploys. This happens as the gas generator detonates, and it is normal.

Although the smoke is non-toxic, it can cause discomfort in breathing. Therefore, open windows immediately to keep ventilation and clean powder attached on the eyes and skin as soon as possible.

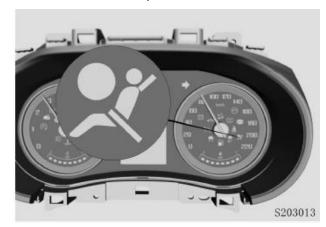
The SRS components will be quite hot after the airbag deploys. Thus, do not touch the area or related components. If you contact such residue by accident, rinse it off with plenty of water immediately to prevent allergy.

The airbag inflates very quickly with quite a strength, which may cause injuries, including bruise, scratch and bone fracture.

The airbag is a disposable product and must be replaced with a new one after deployment in case of collision.

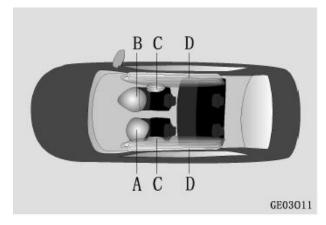
#### **SRS Indicator Lamp**

The SRS indicator lamp is in red.



When the power supply is ON, the SRS indicator lamp will be on for about 3~6 s and then go out. Under normal operation status, the indicator lamp is out.

#### **Airbag**



A: driver's airbag

B: front passenger's airbag

C: side airbag % (if equipped)

D: curtain airbag % (if equipped)

#### **Front Airbag**

The caution label for front airbag is on the front and back sides of the front passenger's sun visor. Please read the label carefully.

#### **Driver's Airbag**

The driver's airbag is installed on the steering wheel, with a trim cover saying "SRS AIRBAG". The airbag deploys when there is head-on collision and the deployment conditions are met.





#### **Front Passenger's Airbag**

The front passenger's airbag is installed in the instrument panel above the glove box, with the cover plate saying "AIR BAG". The airbag deploys when there is head-on collision and the deployment conditions are met.





#### **DANGER**

It is forbidden to install a backward-facing child restraint system on the front seat or have a child under 150 cm or 12 sitting on the front seat. The deployment of airbag will cause injuries to the child. When the vehicle is running, the passenger shall keep correct sitting posture and shall not put the foot or leg on the instrument panel.

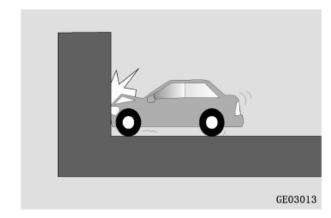
Please do not use the cover plate of front passenger airbag as a storage rack.

Keep the instrument panel and windshield at the front passenger side unblocked. Do not use stick band or coating to cover them or install a bracket (such as that for navigation equipment or cellphone) on them.

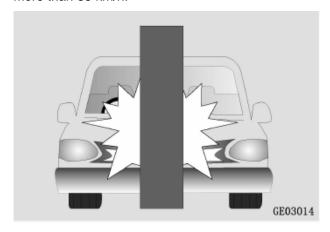
#### **Deployment Conditions of Front Airbag**

The following conditions are standard laboratory collision test conditions under which the front airbag may deploy. However, the possibility of the airbag to deploy in actual collision depends on whether the deceleration generated at collision meets the deployment condition.

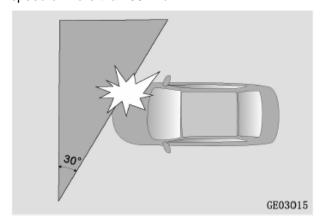
1. The vehicle runs into an unmovable and non-deformable concrete wall at a spot speed of more than 30 km/h:



2. The vehicle runs into an unmovable and non-deformable concrete column at a spot speed of more than 35 km/h:



3. The vehicle runs into an unmovable and non-deformable concrete wall which sets a drift angle of not more than 30 degree with the direction vertical to the running direction of the vehicle, at a spot speed of more than 35 km/h:

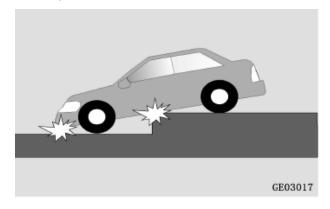


The front airbag may deploy under the following actual running conditions:

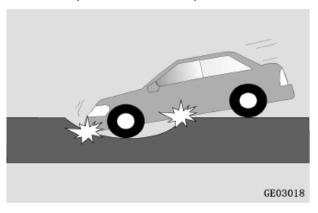
1. The vehicle runs into steps, curbs or similar protuberant obstacles;



2. The vehicle runs downhill and hits the ground surface:

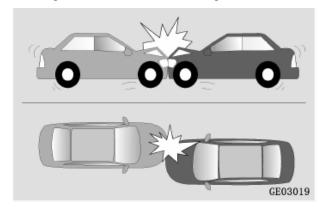


3. The vehicle falls into a deep pit or a deep trench, or the main part of chassis is impacted;



The front airbag may not deploy in the following conditions even through the impact velocity is relatively high. However, the possibility of deployment depends on whether the deceleration of the vehicle generated at collision meets the deployment condition.

1. The vehicle runs into another vehicle face to face, or along a direction of a certain angle;



The impact imposed on the other vehicle in the

running direction will be reduced as both vehicles are flexible and deformable.

2. The vehicle runs into the rear end or the side of a truck;



- ① The truck protection device is of low strength and capable of flexible deformation.
- ②If the hitting position is on the engine hood or other area above the hood, the impact strength of vehicle body does not meet the deployment standard of airbag.
- 3. The vehicle runs into a tree or a column like a tree;

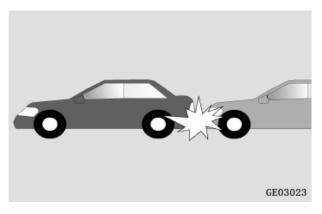


The front airbag may not deploy as the impacted objects may fall down or break off.

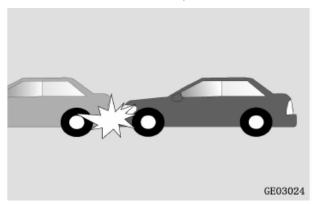
4. The vehicle runs into a concrete wall or the expressway guardrail;



5. The vehicle is impacted by another vehicle at its rear end, and the front end and both sides of the vehicle are not impacted;



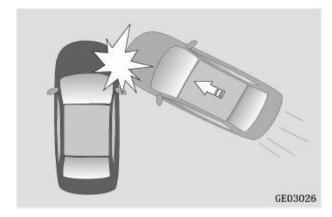
6. The vehicle runs into another vehicle in the same direction at the rear end, and the rear end and both sides of the vehicle are not impacted;



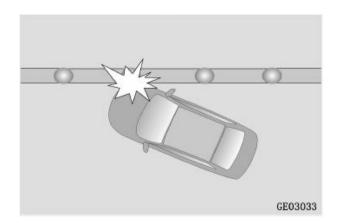
7. The vehicle rolls over or turns upside down;



8. The engine compartment or the tail door is hit in side collision;



9. The vehicle runs into flexible objects like a fence;



# Side Airbag %(if equipped)

The side airbag is installed in the seat backrest, with a label saying "AIR BAG" on the side of the bracket. Side airbag deploys in case of side collision and when the deployment conditions are met, forming a buffer between the occupant and the trim pieces, providing side protection for the occupant's chest.



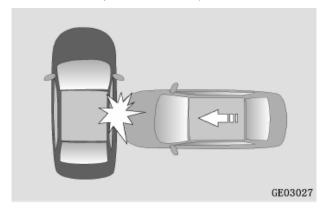
#### DANGER

Please do not use the seat protective sleeve or soft cushion on the seats installed with side airbag, or change the seat material without permission. It may cause failure of airbag deployment or cause injuries in accidental deployment!

Do not hang objects such as coat on the backrest.

# **Curtain Airbag %(if equipped)**

Curtain airbags are installed inside the trim panels of side wall and the roof lining. There are labels on A/B/C pillars close to the roof lining, saying "AIRBAG". Curtain airbags deploy in case of side collision and when the deployment conditions are met, forming a buffer between the occupant and the side wall to protect the occupant's head.



## A

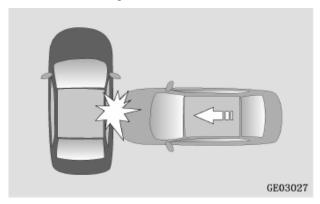
#### **DANGER**

It is not allowed to lean the head or body against the curtain airbag/curtain airbag deploying area on the windows. Do not place any object between the seat backrest and the side door.

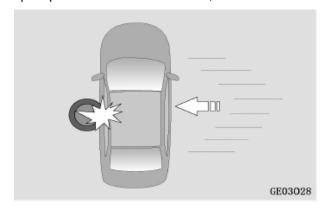
### **Deployment Conditions of Side Airbag**

The following conditions are standard laboratory collision test conditions under which the side airbag may deploy. The possibility of the airbag deployment in collision depends on whether the deceleration generated at collision meets the deployment condition.

1. The vehicle is hit by another vehicle with a dead weight over 980 kg, which is running along the direction vertical to the running direction of the impacted vehicle, and the spot speed at the moment of colliding is more than 25 km/h;



2. The vehicle, in the way of lateral translation, runs into an unmovable and non-deformable concrete column with a diameter of more than 254 mm, at a spot speed of more than 35 km/h;

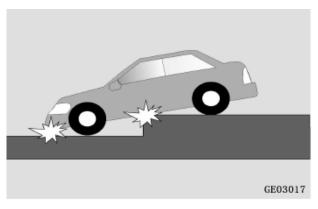


The side airbag may deploy under the following running conditions:

1. The vehicle runs into steps, curbs or similar protuberant obstacles;



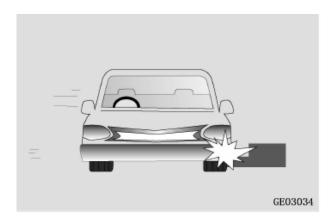
2. The vehicle runs downhill and hits the ground surface;



3. The vehicle falls into a deep pit or a deep trench, or the main part of chassis is impacted;

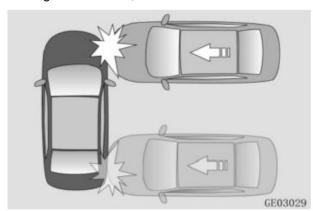


4. The vehicle runs into steps;

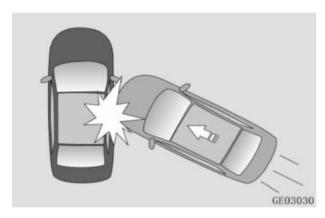


The side airbag may not deploy under the following conditions even through the impact velocity is relatively high. However, the possibility of deployment depends on whether the deceleration of the vehicle generated at collision meets the deployment condition.

1. The area in the front of front windshield or behind the rear windshield is hit by a vehicle coming from the side;



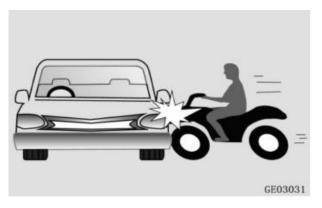
2. The vehicle is hit by a collision from the side and of a certain angle;



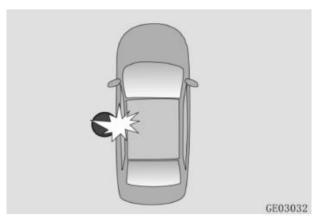
3. The vehicle rolls over or turns upside down;



4. The vehicle is hit by a running object of light weight, like a motorcycle, from the side;



5. The vehicle side is hit by a column of small cross section;



# IV. VEHICLE FUNCTION

# KEY AND REMOTE CONTROLLER

# **Wireless Remote Controller Function**

With the wireless remote-control function, all doors, including the tail door, can be unlocked or locked at a distance about 10 m away from the vehicle, and the windows can be regulated at such a distance too.

#### CAUTION

Please do not bend the key or use it to impact other objects. Please do not place the key in an environment with excessive high temperature for a long time (like on the instrument panel or engine hood under direct sunshine).

Please do not have the key contact with liquid; otherwise the system function may be affected.

Please do not put the key together with devices sending or cutting off electromagnetic wave (such as cellphones, computers, metal seals).

# The remote controller does not work in case of any of the following situations:

- The power supply of the vehicle is in other position than OFF.
- Remote control limit is exceeded.
- The battery of remote controller is low.
- Signals are obstructed by other vehicles or objects.
- External temperature is excessively low or excessively high.

- The remote controller is close to a radio signal source (such as a radio station, military equipment, airport or launch tower, etc.).
- When the remote controller cannot function right, use the mechanical key to unlock or lock doors. (For a vehicle with PEPS system, please start the engine as per the method in the "PEPS System% (if equipped) Standby Start" section.) Please consult a dealer authorized by Changan Automobile if you have any question.

#### **A** CAUTION

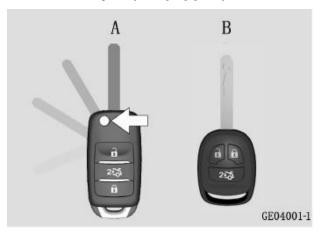
Do not change transmitting power without authorization, and do not add external antenna or use other transmitting antenna without authorization.

It is not allowed to apply harmful interference on legal wireless communication businesses while using the remote controller; if there is any interference, immediately stop using the controller and take measures to eliminate such interference before using it again.

Please do not press any button on the key at will after leaving the vehicle. If the key buttons for over 2,000 times in total while it is away from vehicle, the key will not match to the vehicle any longer, and if it happens, please contact a dealer authorized by Changan Automobile for re-matching the key.

#### Key

#### Common Key %(if equipped)



A: master key

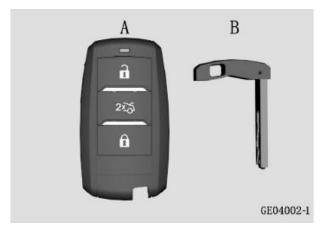
B: auxiliary key

### **WARNING**

It is forbidden to take out the key from the ignition switch when the vehicle is running.

Please lock the vehicle and take with the key when you leave the vehicle.

#### Smart Key %(if equipped)



A: smart key

B: mechanical key

The mechanical key is inserted in the smart key. Refer to Section "IV. Vehicle Function - Replacement of Key Battery - Smart Key" for method of taking out the mechanical key.

## **Key Number**

The number is stamped on bar code plate of the key sets.

### **WARNING**

If the keys are lost, please contact a dealer authorized by Changan Automobile to make a new key with the key number.

#### Unlocking

Press the unlock button to unlock all vehicle doors, and the turn signal lamp will flash once.

#### Locking

Press the Lock button to lock all vehicle doors, and the turn signal lamp will flash twice.

If any of the vehicle doors, tail door and engine hood is not closed, or the power supply is not OFF, the doors cannot be locked by the Lock button.

# Opening of Tail Door by Remote Control

Press the tail door Open button shortly for twice to open the tail door when the vehicle power is OFF.

#### **WARNING**

Make sure that there is no person or barrier around the tail door before using the remote-control button of tail door.

# **Unlocking Mode Switchover**

Press the Unlock and Lock buttons at the same time for over 4s. The buzzer will buzz once, and the unlocking mode is shifted. At this moment, press the unlock button, and only the driver's door will be unlocked. Press the unlock button again, and the other doors will be unlocked. Press the unlock and lock buttons at the same time for over 4 seconds, and it will switch back to four-door unlocking mode.

#### Vehicle Locating

With all doors locked, press the lock button twice consecutively within 2 s to activate vehicle locating function. The horn will honk twice and the turn signal lam will flash for about 10 s to indicate the vehicle location. Press the unlock button while the lamp is flashing, and the vehicle doors will be unlocked immediately.

# Remote Control of Window % (if equipped)

When the vehicle power is at OFF and all doors are locked:

- 1. Long press the Lock button, and all windows start to close; release the button, and all windows stop closing immediately;
- 2. Long press the Unlock button, and all windows start to open; release the button, and all windows stop opening immediately;

As for windows with anti-pinch function, press the Lock button for over 2s, and the window glass will automatically ascend to closed status; press the Unlock button for over 2s, and the glass will automatically descend to completely opened status.

#### **CAUTION**

The remote-control window function is under inactivated state while leaving factory. Please contact a dealer authorized by Changan Automobile for activating such function.

# Remote Closing of Sunroof \*\*(if equipped)

With power supply of the vehicle at OFF, and the ignition key removed (or the smart key not in the vehicle), and all vehicle doors closed, and the sunroof open, press the Lock button for over 2s, and then the sunroof will be closed automatically.

# **Replacement of Key Battery**

#### Note

Do not touch the circuit, or static electricity may be generated to damage the circuit board.

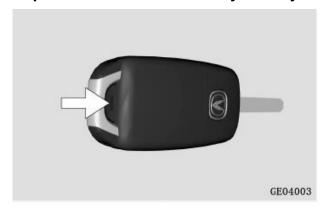
The positive pole and negative pole of the battery shall be installed as per correct marks, or the circuit board will be damaged.

The new battery shall be of same specification with the original battery (3 V, CR2032) of the remote control.

Be careful and align the positive pole of the battery to the positive pole "+" on the battery fixing plate while replacing the battery.

It is easy to damage the circuit board with improper operation during battery replacement; it is recommended to contact a dealer authorized by Changan Automobile for replacement.

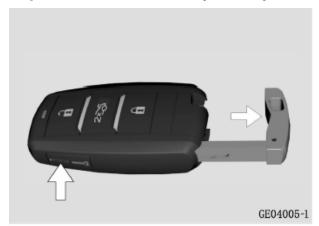
#### **Replacement of Common Key Battery**

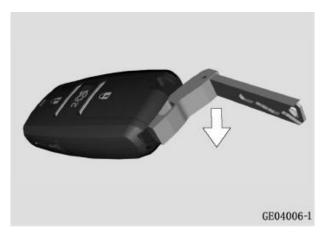




- 1. Use a slim tool to prize up the upper and lower shells of the key slightly.
- 2. Replace the battery.
- 3. Put the circuit board with new battery back to the key shell, and then press to fit the shell.

#### **Replacement of Smart Key Battery**





- 1. Press PUSH button, and take out the mechanical key; then, use the front end of the mechanical key to prize up the key shell.
- 2. Replace the battery.
- 3. Put the circuit board with new battery back to the key shell, and then press to fit the shell.
- 4. Install the mechanical key.

# PASSIVE ENTRY PASSIVE START PEPS SYSTEM \*\*(IF EQUIPPED)

PEPS system has the following functions:

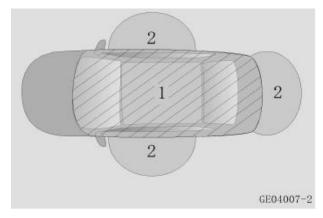
- Wireless remote-control function (refer to Section "Key and Remote Controller Key and Remote Controller")
- Passive entry function
- Push-to-start function
- Steering locking function

# Conditions Affecting Function of PEPS System

PEPS system may not function under the following situations. If so, please use the mechanical key for unlocking/locking:

- The smart key is not within the activation area.
- There are television towers, power stations, gasoline stations, radio stations, large-screen displays, air ports or other facilities generating strong electromagnetic wave or interference nearby.
- There are electronic equipments (such as cellphone, personal computer and power adapter) emitting radio wave nearby.
- The smart key is contacted with or covered by a metallic object (such as window shield membrane containing metal content or substance).
- There are many smart keys operated simultaneously nearby.
- The battery of the smart key is used up.

#### **Activation Area**



1. Activation area of ENGINE START STOP – in compartment.

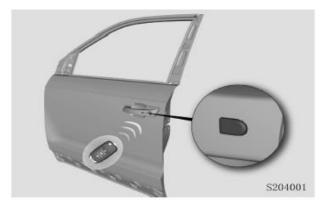
The function can be activated by operation within any area in the vehicle.

2. Passive Entry activation area – within about 0.8 m from the PEPS button on the door handle of driver/front passenger side or on the tail door;

If the smart key is too close to the door handle, the window or the center of rear bumper, it may fail to activate the PEPS function.

# **Passive entry**

Only when the smart key is within the activation area can the function be enabled.



### **Unlocking by PEPS**

When the four doors are locked, press the PEPS button on the external door handle of the driver/front passenger side; and then, all doors will be unlocked simultaneously, and the turn signal lamp will flash once.

#### **Locking by PEPS**

When the four doors are unlocked, press the PEPS button on the external door handle of the driver/front passenger side; and then, all doors will be locked simultaneously, and the turn signal lamp will flash twice.

Under the following conditions, doors cannot be locked with the PEPS button:

- Any of the vehicle doors, tail door or engine hood is not well closed.
- The power supply is not OFF.
- The smart key is left in the vehicle.

• The smart key is left less than 5 cm away from the door handle or directly on the door handle or the metal panel of door.

Refer to Section "Vehicle Function - Passive Entry Passive Start (PEPS) System ※ (if equipped) - Conditions Affecting Operation of PEPS System" for other situations in which the vehicle doors cannot be locked.

#### **Tail Door Opening:**

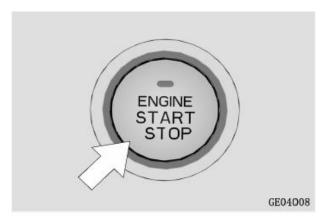
With the tail door locked, if the smart key is within the tail door activation area, operate PEPS button on the lower end of the tail door to open the tail door.



#### **CAUTION**

With four side doors locked, if the smart key is left in the tail door, close the tail door, and the four side doors will be unlocked automatically. The horn will honk for indication. If none of the doors is open within 30 seconds, the four side doors will be locked automatically.

#### **ENGINE START STOP**



With smart key in ENGINE START STOP activation area, press the ENGINE START STOP switch to start or stop the engine, or switch over the power supply mode (ACC, ON and OFF).

ACC/ON mode: Indicator of the "ENGINE START STOP" switch lights up in amber.

OFF mode: Indicator of the "ENGINE START STOP" switch is off.

Refer to "Start and Shutdown of Engine - Passive Start% (if equipped)" section for details of ENGINE START STOP operation.

#### **Power Switchover Procedure (AT)**

1. With the brake pedal not pressed and the gearshift lever at P position, press ENGINE START STOP switch to switch the power state in cycle among "ACC-ON-OFF" modes:

The power supply of the vehicle will be back to OFF mode automatically after it is under ACC mode for about 1 h, so as to prevent battery power running out.

2. With the brake pedal not pressed and the gearshift lever at any position other than "P", press ENGINE START STOP switch to switch the power state in cycle between "ACC-ON" modes:

#### **Power Switchover Procedure (MT)**

With the clutch pedal not pressed and the gearshift lever at any position, press ENGINE START STOP switch to switch the power state in cycle among "ACC-ON-OFF" modes.

#### **CAUTION**

If PEPS function and ENGINE START STOP function cannot work normally due to system faults, please take all keys and go to a dealer authorized by Changan Automobile for consultation.

#### **Standby Start**

The following procedure can be applied to start the engine or change power supply status when the smart key cannot be detected or in case of low battery.

Start the engine: Depress brake pedal (of AT model) or clutch pedal (of MT model), and put the smart key into the cup holder, close to ENGINE START STOP switch at the holder bottom.

After the indicator on ENGINE START STOP switch turns green, press ENGINE START STOP switch, and the engine will start normally.

Switch over power supply mode: Place the smart key in ENGINE START STOP switch, close to the holder bottom, and then press ENGINE START STOP switch. The power supply mode will switch over among ACC, ON and OFF modes in turn.

#### Steering Locking %(if equipped)

With engine shutdown and vehicle power supply at OFF position, open any of the doors, and both the electronic steering lock and the steering wheel are locked. Press ENGINE START STOP switch, and the electronic steering lock will be unlocked automatically.

#### **CAUTION**

If the indicator lamp of ENGINE START STOP switch flashes in green during starting, the steering wheel will not be able to rotate and the instrument will display "Steering lock not released", indicating that the steering wheel is still locked. Slightly rotate the steering wheel to switch the power supply to OFF position, and then press ENGINE START STOP switch. Depress the brake pedal when there is motor sound, and ENGINE START STOP indicator lamp will keep being on in green; the steering wheel is now unlocked.

#### **IMMOBILIZER**

As for vehicle without PEPS system, immobilization authentication is realized through the common key, body control module and engine control unit.

A vehicle with PEPS system is provided with advanced engine immobilizer. Immobilization authentication is guaranteed through the smart key, immobilizer and engine control unit.

Only for the vehicle which passes through the complete immobilizer authentication can its engine be started.

#### **Alert State**

The alert state cannot be activated if any of doors or tail door is not closed.

Activate the alert state through the following methods for a vehicle without PEPS system:

- 1. Park the vehicle and shut down the engine;
- 2. Take out the key from the ignition key;
- 3. Make sure that the engine hood, tail door and all doors of the vehicle are locked:
- 4. Press the Lock button on the key to lock all doors, and the turn signal lamp flashes twice.

Activate the alert state through the following methods for a vehicle with PEPS system:

- 1. Park the vehicle and shut down the engine, and operate ENGINE START STOP switch to shift the power supply of the vehicle to OFF. Then, ENGINES TART STOP switch indicator goes out;
- 2. Take the key out from the vehicle;
- 3. Make sure that the engine hood, tail door and all doors of the vehicle are closed:

4. Operate the PEPS button on the external door handle to complete locking, or press the Lock button of the remote control for locking; then, the turn signal lamp flashes twice.

With the steps above done, the immobilizer indicator on the instrument will be on and will flash about once 1s after a period; then the engine immobilizer is successfully activated and the vehicle is under alert state.

#### **Release of Alert State**

As for a vehicle without PEPS system, press the Unlock button to open the vehicle doors, and then the alert state is released; after that, the immobilizer indicator on the instrument goes out.

As for a vehicle with PEPS system, press the Unlock button or the PEPS button on the driver side door handle to open the vehicle doors, and then the alert state is released. Shift the power to status ON, and the engine immobilization authentication is completed successfully. The immobilizer indicator on the instrument goes out.

With the unlocking procedure done, if any of the vehicle doors or tail door is open, or the ignition switch is not turned on within 30s, the doors will be locked automatically, and the system will re-enter into the alert state.

### **Warning State**

The warning state will be activated if any of the following situations happen under the alert state:

Any of the vehicle doors is opened without use of the PEPS button or remote-control key (including opening a door with the mechanical key under the alert state); The tail door is opened illegally;

The engine hood is opened;

The power supply state of the complete vehicle is changed.

After entering the alarm state, the immobilizer indicator on the instrument flashes at a high speed; the horn honks, and the turn signal lamp flashes continuously.

#### **CAUTION**

Please activate the immobilizer if there is no occupant in the vehicle, so as to prevent the system from entering the alarm state when the occupant leaves the vehicle.

The engine cannot operate normally under the alarm state. Please do not start the engine.

# **Release of Warning State**

Use the PEPS button or the remote-control key to unlock vehicle door to release the warning state. At this time, the immobilizer indicator on the instrument goes out; the buzzer buzzes; the turn signal lamp flashes for 4 times.

### A

#### WARNING

Please do not refit or add other anti-theft systems on the vehicle, as it may damage the central control unit of the vehicle and affect other electrical devices.

Owner shall take all responsibilities for losses caused by refitting or adding other electrical systems without authorization, and any damage caused thereby will not be covered by warranty.

#### **DOOR LOCK**

### **External Operation of Door Lock**



Rotate the key counterclockwise to unlock the door and clockwise to lock the door.

When the doors are all closed, if the key is used to unlock/lock the driver side door, then all doors will be unlocked/locked.

#### **Wireless Remote-Control Operation**

Please refer to Section "Vehicle Function - Key and Remote Controller - Wireless Remote-Control Function".

### PEPS Operation %(if equipped)

Please refer to Section "Vehicle Function - Passive Entry Passive Start (PEPS) System \* (if equipped) - Passive Entry Function".

#### CAUTION

In cold and humid environment, the door lock and the mechanical device of the door will be frozen, and the comfort level of operating the vehicle doors will be reduced slightly.



#### **WARNING**

Do not leave the spare key in the vehicle. Please always take the key with you when the vehicle is left unattended, and close all windows and lock all doors.

# **Internal Operation of Door Lock**



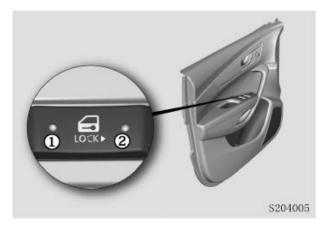
**Unlocking:** Turn the door lock button to unlocking position (1).

**Locking**: Turn the door lock button to locking position (②).

When all doors are closed, turn the door lock button of the driver's door to unlocking/locking position, and then all doors will be unlocked/locked.

Anti-error locking of driver's door: After opening the driver's door, set the door lock button to lock status, and the lock button will restore to unlock status automatically when the door is closed.

#### **Central Door Lock Switch**



Press central door lock switch (Item 1), and then all doors will be unlocked;

Press central door lock switch (Item 2), and then all doors will be locked.

#### **CAUTION**

The central door lock switch will function only when all doors are closed.

### **DANGER**

- The vehicle doors shall be locked when the vehicle is running, so as to avoid accidental opening of the doors.
- Check for vehicle or pedestrian near the door to be opened before open the door.

#### **Unlock at Collision**

When the power supply of the vehicle is ON, all vehicle doors will be unlocked automatically (under the condition that the battery and door locks

function right) if a collision is detected.

#### **Thermal Protection of Lock Motor**

Execute unlocking/locking operation continuously and rapidly for over 10 times within 10s, and the overheating protection of vehicle motor will be activated, and the door lock operation will be prohibited. If so, only mechanical unlocking/locking is available. The door lock restores to normal condition after 1 min. In case of any conflict with unlocking upon collision, the latter has the priority.

# **Automatic Speed Responsive Locking**

All doors will be locked automatically when the vehicle speed is more than 20 km/h.

#### **CAUTION**

The automatic (speed responsive) locking function is under inactivated state while the vehicle leaves the factory. Please contact a dealer authorized by Changan Automobile for activating such function.

# Automatic Unlocking upon Parking

All vehicle doors will be unlocked automatically when the power supply is turned to OFF position after the vehicle stops and the engine stalls.

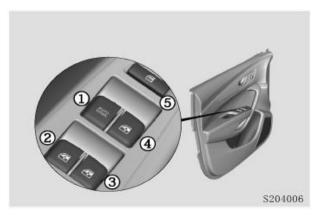
# **Child Safety Lock**

Please refer to Section "Vehicle Safety System - Child Safety - Child Safety Lock".

#### **POWER WINDOW**

The windows can be operated when the power supply is at ON position or within 1 min after the power supply is shifted to ACC/ON position from ON position.

On each door there is a power window switch for controlling. On the driver's door, there is a window lock switch and a switch controlling the passenger windows.



- 1- left front power window switch;
- 2- left rear power window switch;
- 3- right rear power window switch;
- 4- right front power window switch;
- 5- power window lock switch;

#### **Window Lock Switch**

Press the switch to prevent the window regulation by passengers. Press the switch again to release window locking.

# **Opening and Closing of Window**

Open: Press down the switch;

Close: Pull up the switch.

#### **CAUTION**

In cold and humid environment, the power windows may not work normally due to freeze.

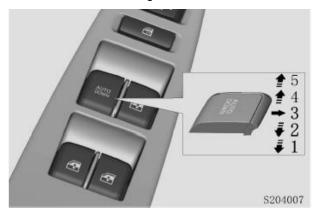
To extend the service life of fuse and prevent damages to the power window system, please do not regulate two or more windows at the same time. Do not try to open and close the same window at the same time, or the window will stop functioning.

There are two ways to operate the windows: onebutton descending/ascending and manual descending/ascending.

# One-button Descending/Ascending \*\*(if equipped)

One-button window regulator switch has five positions for actions from the bottom the top, namely:

- 1. One-button descending
- 2. Manual descending
- 3. Middle position
- 4. Manual ascending
- 5. One-button ascending



To open or close the window, press down or pull up the front end of corresponding switch to stop position.

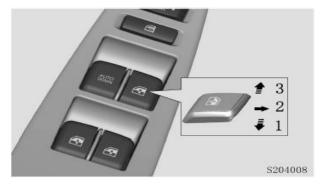
### **CAUTION**

During one-button ascending/descending movement of window glass, operate the switch in opposite direction, and the glass will stop moving immediately.

# **Manual Lowering/Lifting**

The manual window regulator switch has three positions for actions from the bottom the top, namely:

- 1. Descending
- 2. Middle position
- 3. Ascending



# Anti-pinch Function \*\*(if equipped)

The window has anti-pinch function for one-button descending/ascending operation. If the glass encounters a resistance when it is ascending, it will stop and descend for a certain distance automatically. The activation area anti-pinch function is 4~200 mm below the window frame.

### **MARNING**

The anti-pinch function may be disabled due to improper window closing operation, resulting in risk of personal injury.

# **Anti-pinch Restraint Function**

If the anti-pinch function is activated continuously twice at the same position, the function will be inactivated. If so, only manual ascending or descending is available for window regulation. The function restores after 10 seconds.

#### **CAUTION**

The anti-pinch function will be inactivated temporarily if any obstacle is detected in two continuous window closing operations. In such case, please make sure the obstacle will be removed before the next window closing operation.

It may entail re-initialization of anti-pinch function in the following conditions:

- 1. The anti-pinch function has been activated for 3 continuous times at the same position, and has failed to restore:
- 2. The battery power supply is disconnected or the power supply voltage is less than 6 V;
- 3. The window frame is severely deformed due to exogenous action, and the window glass is already out of the anti-pinch area;
- 4. The rate of counter-action is over 5% during operation.

# Re-initialization of Anti-pinch Function

- 1. Lift the switch until the window is completely closed;
- 2. Release the switch;
- 3. Lift the switch again for more than 1 second, and repeat it;
- 4. Press the switch until the window is completely opened:
- 5. Lift the switch, and try to execute automatic ascending.

If the window glass does not ascend or descend automatically, please repeat the procedures above for setting.

#### A

#### DANGER

The risk of pinching still exists in spite of the antipinch protection. Make sure the area of glass movement is unblocked. Anti-pinch function does not work against the following objects and conditions:

- Flexible, light and thin object, like a little finger.
- A clearance of 4 mm.
- Manual ascending operation right after an automatic counter movement. Anti-pinch function provides no protection under such conditions. To close the sunroof, make sure no body part is within the glass movement area.

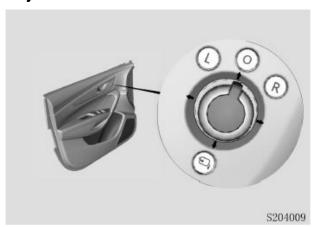
#### **REARVIEW MIRROR**

#### **Exterior Rearview Mirror**

The exterior rearview mirror is a convex mirror, providing a wider view. Please adjust the exterior rearview mirror before driving to see the sides of vehicle exactly.

The exterior rearview mirror can be adjusted when the power supply is at ACC/ON position.

#### **Adjustment of Exterior Rearview Mirror**



- 1. Select rearview mirror: Rotate the main switch knob to switch over between the left (L)/right (R) exterior rearview mirrors.
- 2. Adjust direction: Rotate the knob to adjust the mirror upward, downward, leftward and rightward. After adjustment, set the switch in the middle position (O), so as to avoid adjustment by mistake.
- 3. Rearview mirror folding switch (if equipped).



#### **DANGER**

The object in the exterior rearview mirror looks closer than it actually is. Do not evaluate the distance to the vehicle behind based on the image in the mirror. Always confirm the actual distance to the vehicle behind by observing vehicle behind; otherwise, it will be more likely to have accident.

Do not operate the exterior rearview mirror when the vehicle is running; otherwise, the vehicle may loss control, leading to accidents or even causalities.

#### **CAUTION**

If the exterior rearview mirror is frozen, do to adjust or scratch the mirror surface violently.

Stop adjustment when exterior rearview mirror reaches the maximum angle possible, so as to avoid damage to the motor.

Do not adjust the exterior power mirror forcibly by hand; otherwise the mirror components may be damaged.

#### **Manual Adjustment**

Press the edges of exterior rearview mirror glass in case of faults, for example, electrical fault.

# Automatic Folding of Exterior Rearview Mirror \*\*(if equipped)

Rotate the knob to exterior rearview mirror folding button, and the mirror will be folded up automatically; rotate the knob away from the position, the left and right rearview mirrors will deploy automatically at the same time.

#### **CAUTION**

If it is required to manually fold the rearview mirror with electric folding function, please operate when the rearview mirror is static; otherwise the rearview mirror may not reset or may be loose, or the components may be damaged. If the rearview mirror fails to reset or becomes loose, try to initiate the electric folding function for resetting.



#### **DANGER**

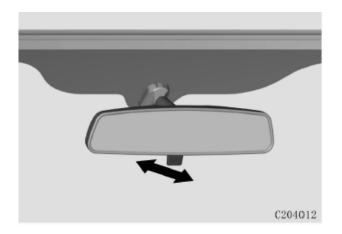
For fear of damage, please do not touch the rearview mirror during automatic folding course.

Always unfold the left and right rearview mirrors and adjust the mirrors properly before driving.

#### **Interior Rearview Mirror**

Before driving, adjust the interior rearview mirror to get the maximum rear sight field. Do not place objects that interfere with rearview on the rear seat or cargo area.

Pull the handle under interior rearview mirror towards the direction shown in the figure, to reduce dazzling during night driving.



# **SUNROOF %(IF EQUIPPED)**

The sunroof is available for adjustment when the power supply is at ON position or within 1 min when the power supply is switched to ACC/LOCK position from ON position.

## **DANGER**

There is a risk of injury as the body part extremely close to the sunroof may be pinched when the sunroof is closing.

Get away from the sunroof moving area when the sunroof is closing.

The child who operates the sunroof may get pinched. Therefore, never left a child alone in the vehicle as there is risk of injury.

The sunroof can be opened in two ways, sliding backwards to open or tilting at the rear end.

When the sunroof slides to open, the slight fluctuation of indoor pressure may make noise. If so, change the sunroof position slightly or open the sunroof for a little to reduce or eliminate the noise.

#### **CAUTION**

The sunroof only opens when there is no ice, snow or other sundries on it; otherwise there may be a fault.

During vehicle washing, please ensure that the sunroof is closed in place, and please do not use a hydraulic giant to rinse the sealing strip of the sunroof glass or to rinse around it.

Please conduct regular maintenance to the sunroof (every three months). Please timely wipe off and clean out the dust and other dirt if there is any on the surface of the sealing strip of the sunroof glass and in the guide rail.

The information hereinafter is mainly based on the automatic operation mode.

#### **Scuttle**

The operation method of the scuttle is shown below:

- 1. Manual operation: Press the scuttle control button shortly, and the scuttle glass will move step by step;
- 2. Automatic operation: Long press the scuttle control button, and the scuttle glass will move automatically.

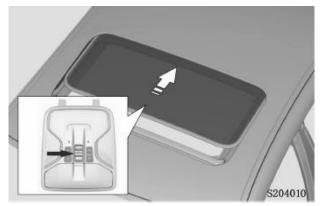
Toggle any button of the scuttle to stop glass movement when the scuttle is moving automatically.

#### **CAUTION**

The sun visor of scuttle is designed to slide along with the scuttle. Therefore, do not put down the sun visor when the scuttle slides to open.

Please do not press the scuttle control button for a long time, or the scuttle may be initialized or its motor and system parts may be damaged.

## **Sunroof Sliding**

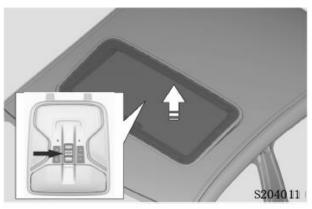


Slide sunroof to open: Toggle button towards the rear end of vehicle.

Slide sunroof to close: Toggle button towards the front end of vehicle.

The sun visor of sunroof will be put down automatically along with the sunroof glass when the sunroof slides to open. After the sunroof is closed, the sun visor can be put down or deployed manually.

#### **Sunroof Tilting**



Tilt sunroof: Press button upwards, or toggle button towards the front end of vehicle;

Close sunroof: Press button upwards again, or toggle button towards the rear end of vehicle.

#### **Panoramic Sunroof**

Operation methods of sliding glass (front glass) of panoramic sunroof are seen below:

- 1. Manual operation: Press the sunroof glass control button shortly, and the glass will move step by step;
- 2. Automatic operation: Long press the sunroof glass control button, and the glass will move automatically.

The operation methods of sun visor of panoramic sunroof are seen below:

- 1. Manual operation: Press the sunshade control button of sunroof shortly, and the sunshade will move step by step;
- 2. Automatic operation: Long press the sunshade control button of sunroof, and the sunshade will move automatically.

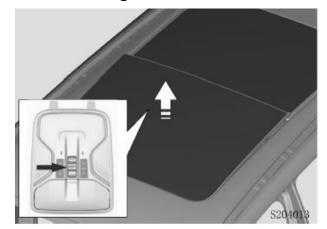
Press glass control button of the sunroof to stop glass movement during automatic sunroof glass movement.

Press/toggle any button of the sunroof to stop sunshade movement when the sunshade is moving automatically.

#### **CAUTION**

Do not operate the panoramic sunroof for a long time. The motor of panoramic sunroof is capable of overheating protection, which means it will stop operating when the temperature is over set protective value after continuous working, and then restore to normal after it cools down to normal temperature.

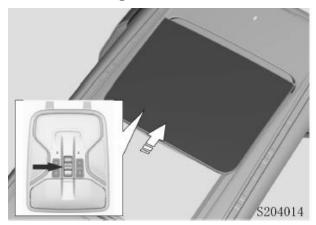
#### **Sunroof Tilting**



Tilt sunroof: Press button upwards;

There is no division of manual/automatic operating modes of tilting function.

#### **Sunroof Sliding**



Slide sunroof to open: Toggle button towards

the rear end of vehicle;

Slide sunroof to close: Toggle button towards the front end of vehicle.

The sunshade will be open automatically along with the sunroof glass when the panoramic sunroof opens. After the sunroof is closed:

Open sunshade: Press "";

Close sunshade: Press "

# Remote Control of Sunroof by Key

Please refer to Section "IV. Vehicle Function - Key and Remote Controller - Key".

#### **CAUTION**

- After the vehicle is running through a frozen area in winter or at night, the sunroof can be opened only after unfreezing. Never open the sunroof forcibly.
- When the vehicle is running on a bumpy road or in mountain area, do not keep the sunroof fully open for a long time.
- When the vehicle speed is over 120 km/h, do not open the sunroof.

# **Anti-pinch Function**

Under the temperature between -20°C and 80°C, the sunroof will stop and move in the opposite direction if it encounters a resistance during closing.

The anti-pinch function of the sunroof can only be activated for automatic movement of the sunroof class.

# A

#### **DANGER**

For the safety, do not put head or hand out of the sunroof, so as to avoid injury.

If there is a tiny barrier in the sunroof guide rail, the anti-pinch function will be activated during movement of the sunroof glass, causing the failure of sunroof closing. Make sure there is no barrier in the way of sunroof closing.

### A

#### **DANGER**

The risk of pinching still exists in spite of the sunroof anti-pinch protection. Make sure the area of glass movement is unblocked. Anti-pinch function does not work against the following objects and conditions:

- Flexible, light and thin object, like a little finger.
- A clearance of only 4 mm.
- Manual closing operation right after an automatic counter movement.

Anti-pinch function provides no protection under such conditions. To close the sunroof, make sure no body part is within the glass movement area.

#### **Sunroof Initialization**

Battery outage or low battery may cause abnormality of sunroof working logic, and the sunroof may not function right if so. With battery functioning right and vehicle power supply at ON position, execute initialization with the following steps:

#### Scuttle Initialization:

- 1. Press the button upwards, or toggle it towards the front end of vehicle, and hold it until the scuttle tilts up to the farthest position possible, and then release the button;
- 2. Press the button towards the front end of vehicle again within 3s until the scuttle bounces up and down for one cycle before it stops moving, and then release the button. The initialization is done now.

#### **Panoramic Sunroof Initialization:**

- 1. Toggle the button forwards and hold it. Release the button when the panoramic sunroof starts joggling, accompanied with mechanical sound;
- 2. Toggle the button forward again within 3s and hold it. The glass and sunshade of panoramic sunroof will operate for a cycle of opening and closing. Release the button when the sunshade is fully closed, and the initialization is done.

#### **CAUTION**

Before initialization, make sure the glass and sunshade of the sunroof are fully closed.

# TAIL DOOR

# **Unlocking of Tail Door**



Press the tail door open button and lift the tail door upward within 30 s after the whole vehicle unlocking. The tail door will open automatically when it reaches a balance position, and the trunk lamp will be on.

# **Closing of Tail Door**

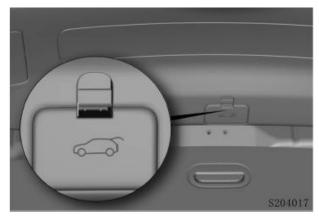
Pull the tail door downward to the balance point, and then press the door forcibly to close and lock it.

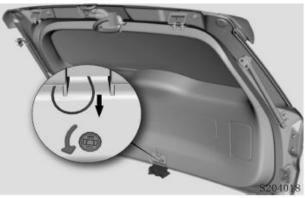
#### DANGER

- To close the tail door, please press it down from the outside. Do not use the auxiliary handle to close the tail door directly to avoid pinching.
- Children are not allowed to operate the tail door switch for there is a risk of pinching.
- The tail door can be used only when it is fully open. Using the semi-open tail door may cause injury if the door falling off.

# **Emergency Unlocking of Tail Door**

Please open the tail door from inside when the tail door is locked and the unlock switch is failed. See "III. Vehicle Safety System - Seat - Adjustment of Rear Seats" for instruction. Put down the rear seats. Find the cover plate on the tail door trim panel, as shown in the figure. Remove the cover plate. Pull the escape cable of tail door downwards and push the tail door upwards at the same time to unlock it.





If the method above fails, rotate the knob of tail door lock counterclockwise with a tool to the farthest position, and then push the tail door upwards to unlock it.

#### **CAUTION**

It means the tail door has a fault if emergency unlocking is required. Please send the vehicle to a dealer authorized by Changan Automobile for inspection.

# **Precautions to Luggage Storage**

- The luggage dimensions shall comply with the storage space of tail door. Make sure the tail door is locked normally;
- The weight of luggage shall not exceed 40 kg; otherwise the trim pieces around the tail door may be damaged;
- Any round or cylindrical luggage shall be fixed securely to prevent it from impacting the tail door or the trim plates on both sides.

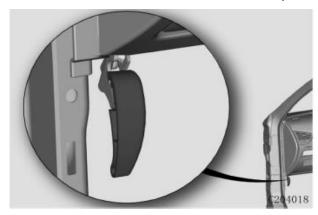
#### WARNING

It is forbidden to store any flammable, combustible, poisonous and corrosive article; it is forbidden to carry any cargo with the tail door open.

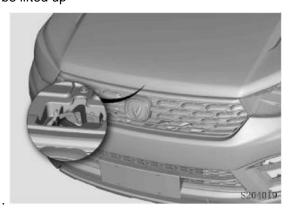
#### **ENGINE HOOD**

# **Opening of Engine Hood**

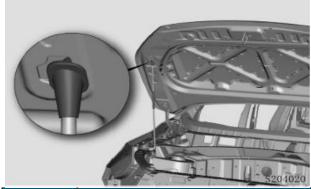
1. Inside the vehicle, pull up the engine hood unlock handle on left lower side of instrument panel.



2. Move the unlock tab at the front center of the engine hood rightwards, until the engine hood can be lifted up



3. Lift the engine hood and support it with stay.



#### WARNING

Please open the engine hood when the power supply is at OFF position and the parking brake is applied.

Make sure that the front windshield wiper is attached to the windshield before opening the engine hood; otherwise the windshield wiper or the engine hood may be damaged.

### **DANGER**

The stay must be plugged in the slot to prevent the engine hood from falling.

Please do not move the vehicle when the engine hood is opened. Never open the engine hood if there is steam escaping from the engine compartment for fear of injury.

Hold the plastic-coated part of the stay to prevent scald.

# **Closing of Engine Hood**

- 1. Lift the engine hood, and take out the stay to fix it in the holder.
- 2. Lower the engine hood, and let it fall freely at a height of about 30 cm. Inspect and confirm that the engine hood is completely locked.



#### **DANGER**

Make sure that the engine hood is completely locked before driving, to avoid accidents due to view blocking when engine hood pops open in a sudden.

Do not pull the engine hood release lever when the vehicle is running.

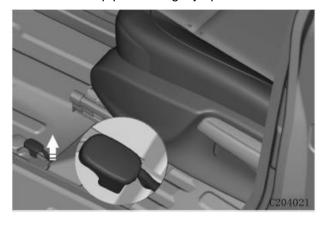
## **FILLER CAP PLATE**

The filler is at left rear side of the vehicle.

The unlock handle of filler cap plate is at left side of the driver seat.

#### ON

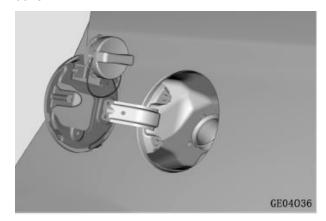
- 1. Turn the ignition key to OFF position, and close all doors and windows.
- 2. Pull the unlock handle of filler cap plate upward, and the filler cap plate is slightly opened.



- 3. Completely open the filler cap plate.
- 4. Rotate the filler cap plate counterclockwise to take it off.



5. Put the filler cap on the back side of fuel tank cover.



6. Put the fuel gun nozzle completely into the fuel tank, and then fix it and start filling.



#### DANGER

Fuel is highly flammable. Ignition, open fire or smoke shall be forbidden, and spark shall be avoided. Shut down the engine before filling the tank.

#### **CAUTION**

- Please use automobile gasoline. The fuel system and engine may be damaged if improper fuel flows into the fuel system.
- Please do not use gasoline that contains methyl alcohol or ethyl alcohol.
- Do not spray fuel on paint surface; otherwise, the paint may be damaged.
- If the fuel tank cover cannot be opened due to freeze, please slightly push or tap the cover to remove the ice, and then open the cover.

# A

#### **DANGER**

- Please open the filler cap slowly to avoid fuel injection due to excessive fuel pressure.
- Stretch the fuel gun into the fuel tank as deep as possible, or the fuel may spill out from the tank, leading fire and explosion.
- It means the fuel tank is full if the fuel gun turns off automatically. Do not continue filling; otherwise, the fuel may spill over, causing damages to the fuel system.
- Please touch the vehicle body to discharge static electricity before removing the filler cap or contacting the fuel nozzle. Do not get in the vehicle during filling for fear of regeneration of static electricity.

#### Off

- 1. Reinstall the filler cap plate on the filler and rotate it clockwise to close it until a click sound is heard clearly.
- 2. Close the filler cap.

### STEERING WHEEL



#### **DANGER**

Please keep correct sitting posture. It is forbidden to adjust the steering wheel when the vehicle is running; otherwise, accident may be caused as the steering column lock fails in a sudden.

# **Steering Wheel Adjustment**

1. Pull the adjusting lever of steering wheel downwards to release the steering column locking mechanism:



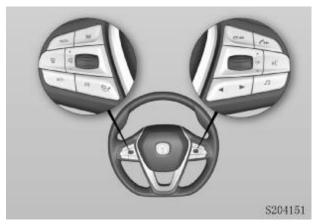
- 2. Adjust the steering wheel to a proper position;
- 3. Push the steering wheel adjusting lever to original position, and lock the steering wheel.

#### **CAUTION**

The driver's airbag and the horn are in the steering wheel.

Please shake the steering wheel upward and downward before driving to make sure that the steering wheel is locked completely.

# **Buttons on Steering Wheel**



#### 1. [MODE]

Press shortly: Press to switch in cycle among FM→AM→USB. If there are external devices, the system enters playing status automatically, and the current mode will be displayed. If there is no external device, the system skips the mode automatically. If the navigation is running in front ground, the switching process is conducted in background.

Long press: Turn on/off the system.



Press shortly: Answer the phone/search forward for radio station/next song.

Long press: Select the next stored radio station/fast forward.



Press shortly: Hang up the phone/search for radio station/previous song.

Long press: Select the last stored radio station/rewind.

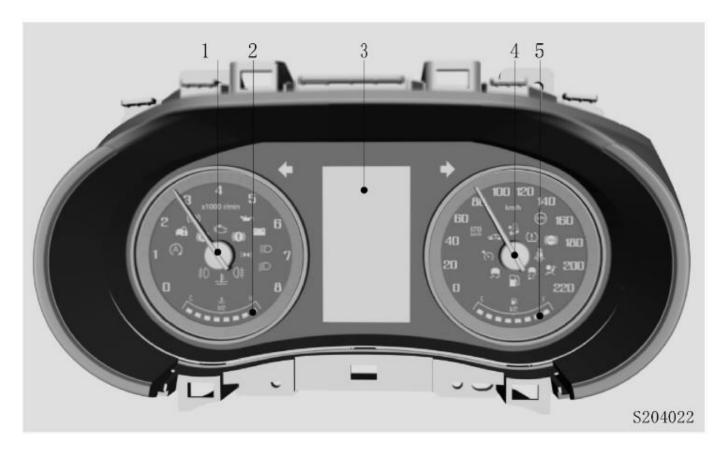
- 4. [#/=]
- : Increase sound volume.
- : Decrease sound volume.
- 5. [ ]: Mute/Pause.
- 6. [1]: Enter Bluetooth dial-up main interface.
- 7. [◄/►/▲/▼/OK]: instrument operating button

Press ▼/▲ to switch among the driving mileage, average fuel consumption, trip mileage A/B, tire information and cruise speed ※ (if equipped). Long press OK button to reset average fuel consumption and trip mileage A/B in order.

Press **◄/▶** shortly to change over among the trip computer interface, vehicle information interface, setting interface and navigation interface ※ (if equipped).

# **INSTRUMENT CLUSTER**

# **Instrument**



- 1. Engine tachometer
- 2. Coolant thermometer
- 3. Information display

Trip mileage A

Trip mileage B

Total mileage

Average fuel consumption

Endurance mileage

External temperature

Cruise speed

Navigation information

Warning information in text

AT gear

- 4. Speedometer
- 5. Fuel gauge

#### **Speedometer**

It indicates the vehicle speed in km/h.

#### **Engine Tachometer**

The current rotation speed (rpm) of engine is equal to the indicated value x1,000 r/min. Driving at maximum rotation speed all the time may damage the engine.

#### Fuel Gauge

It indicates approximately residual fuel volume in the fuel tank.

When the segment code is 8 (at F position), it means the fuel tank is full.

When the segment code is 1 (at E position), it means the fuel tank is approximately empty.

#### **Engine Coolant Temperature Gauge**

It indicates the temperature of engine coolant. The segment code will stop in the middle range if the coolant temperature is within normal range.

When the segment code is 7 or above, it means the engine is overheated. Shut down the engine immediately and find out overheating causes after the engine is cooled.

#### **DANGER**

It is forbidden to start the engine again before remove the faults that cause overheating.

#### Alarm Lamp and Indicator

When the ignition switch is turned on, the following warning lamps and indicator lamps will be on shortly and then go out about 3s later:

- Airbag
- Low Fuel Level
- Tire Pressure Alarm \* (if equipped)
- Brake Fluid Level Indicator
- Electric Parking Brake (EPB) Fault
- Electrical Parking Brake (EPB)
- **ABS**
- Electronic Stability Control (ESC)
- **OFF** Electronic Stability Control (ESP OFF)
- **EPS**
- **Engine Coolant Temperature**

When the power supply of vehicle is at ON position, or after the engine is started, if any warning lamp or indicator lamp is not on or fails to go out after being on, it indicates a system fault. Please contact a dealer authorized by Changan Automobile for inspection.

# High Beam Lamp ≡□

The indicator lamp lights up when the high- beam lamp is on.

# Low beam lamp



The indicator is on when the low beam function of headlight is turned on.

# Rear Fog Lamp



The indicator lamp lights up when the rear fog lamp is on.

# Position Lamp



The indicator lamp lights up when the position lamp is on.

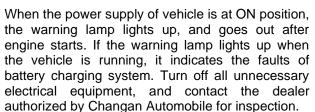
# Turn Signal Lamp

When the steering switch or the emergency alarm switch is turned on, the turn signal lamp indicator flashes with "click" sound. If there is any other warning tone (such as warning for unfastened seat belt), there will be no "click" sound.

#### Oil Pressure

When the power supply of vehicle is at ON position, the warning lamp lights up, and goes out after engine starts. If the warning lamp keeps being on after the engine starts, or lights up when the vehicle is running, it indicates excessively low oil pressure or lubrication system fault. If so, park the vehicle safely and shut down the engine as soon as possible to check the engine oil level.

# **Charging of Battery**



# Airbag

If the warning lamp is on when the vehicle is running, it indicates a system fault. Please contact the dealer authorized by Changan Automobile for inspection.

# Seat Belt



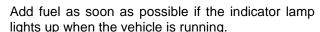
# Engine Fault 🗀

When the power supply of vehicle is at ON position, the warning lamp lights up, and goes out after engine starts. If the warning lamp keeps being on after engine starts, it indicates a fault of engine control module or emission control system. Please contact a dealer authorized by Changan Automobile for inspection.

# Immobilizer 🖼

The indicator lamp will flash at a low frequency after the immobilizer is activated, indicating that the vehicle is under alert state, or it will flash at a high frequency to indicate that the vehicle is under warning state.

# Low Fuel Level



After the indicator lamp of low fuel level is on. please add fuel timely even a longer driving distance is displayed on the driving range. See the section of "Endurance Mileage" for details.

# Engine Coolant Temperature



The indicator lamp lights up when the segment code of coolant thermometer indicates 7. If the indicator lamp keeps being on, or lights up after the engine is started or when the vehicle is running, it indicates that the engine does not achieve the best performance yet. If the engine keeps operating, the warning lamp should be off several minutes later, indicating that the working temperature of the engine is normal.

# Cruise \*\*(if equipped) (\*)

Press cruise control switch to enable the function, and the indicator lamp will be on.

# Idling Start-Stop %(if equipped)(A)

When the start-stop function is activated but the current state does not allow idling start-stop, the indicator lamp is on. Refer to "V. Driving Vehicle -Idling Start-stop".

# Tire Pressure Warning %(if equipped) (1)

If the indicator lamp lights up when the vehicle is running, please contact a dealer authorized by Changan Automobile for inspection.

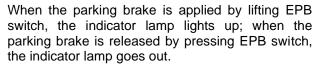
# Electric Parking Brake (EPB) Fault

If the indicator lamp fails to light up or keeps being on, it indicates ESC fault. If so, please contact a dealer authorized by Changan Automobile for maintenance as soon as possible.

# **HDC Working Indicator Lamp**

When HDC (Hill Decent Control) function is activated, this indicator lamp is on.

# Electrical Parking Brake (EPB)



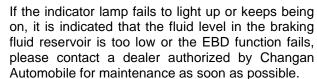
If the indicator lamp fails to indicate EPB working condition normally, please contact a dealer authorized by Changan Automobile for maintenance as soon as possible.

It is prohibited to apply parking brake while the vehicle is running normally; otherwise, the vehicle may not run stably and the parking brake system may be damaged.

## **WARNING**

It is prohibited to apply parking brake while the vehicle is running normally; otherwise, the vehicle may not run stably and the parking brake system may be damaged.

# **Brake System Fault**



# ABS (ABB)

If the warning lamp is on when the vehicle is running, it indicates a system fault. Even so, the brake still functions (without ABS). Please contact a dealer authorized by Changan Automobile as soon as possible for maintenance.

# Electronic stability control (ESC)

# indicator lamp

When the vehicle is running, if the indicator lamp flashes and then goes out, it indicates that the ESC function is on.

If the indicator lamp keeps being on, it indicates an ESC fault, and the ESC system will be shut down as long as the fault exists. Please contact a dealer authorized by Changan Automobile for maintenance as soon as possible.

# Electronic stability control OFF



The indicator lamp lights up when the system is turned off. It goes out when the system is re-started or the ignition switch is turned on.

# **EPS Indicator Lamp**



If the indicator lamp flashes or lights up suspiciously when the vehicle is running, it indicates an EPS fault. Please contact a dealer authorized by Changan Automobile for maintenance as soon as possible.

# **Audio Warning and Reminder**

#### Door open

When the power supply is at ON position, or the engine is started, there will be prompt tone if any of the doors is open.

#### **Unfastened Seat Belt Reminder**

If the driver or the front passenger does not fasten the seat belt, there will be prompt tone if the vehicle speed exceeds preset value (7 km/h). After 5 min, the prompt tone stops.

Note: The audio warning only applies to models configured with unfastened seat belt reminding function for front occupants.

#### **Lighting Lamp**

There will be prompt tone if the headlamp or the position lamp is still on when the ignition switch is turned off and the driver leaves the vehicle after opening the driver side door.

#### **Unlocking Door**

When the ignition switch is turned off, and any of the side doors, engine hood and tail door is opened, there will be prompt tone when the doors are unlocked after pressing the Lock button on the key.

#### "Follow Me Home" function is ON.

There will be prompt tone when "Follow Me Home" function is activated (with the power supply of vehicle at OFF position, switch the light handle from OFF to Low Beam, and then to OFF again within 2s).

#### **Low Remote-Control Battery**

With power supply at ACC or OFF position, press the Unlock button of key and open the vehicle door on driver side. There will be prompt tone when the remote-control battery is too low.

#### Key not detected

With power supply at ON/ACC position, there will be prompt tone when the key is not in the vehicle.

#### **Key in Vehicle**

When press Lock button on door to lock the vehicle,

there will be prompt tone if the key is left inside the vehicle.

#### Shift to P Position %(if equipped)

There will be prompt tone if the gearshift lever is not in P position when the engine starts.

#### **Unclosed Sunroof**

With the ignition switch OFF, if the sunroof is not closed, there will be prompt tone.

# Warning for Exiting Immobilizer Activated Status

With vehicle power supply at ACC/OFF position, there will be prompt tone when the vehicle exits immobilizer activated status.

#### Low Fuel Level

For the first time the fuel level reaches the warning point, the indicator lamp of low fuel level lights up, accompanied with prompt tone.

#### **INFORMATION DISPLAY**

# **Trip Information**

### **Trip Mileage**

**Trip Information A Trip Information B** (of the same function) Record the mileage of single trip. The display range is 0.0 to 999.9 km, and the trip odometer will reset automatically and re-count trip mileage when the displayed value exceeds 999.9 km. Long press OK button to reset the function of current interface.

#### **Total Mileage**

999999 km Record the total mileage driven. Range: 0-999999 km. When the total mileage exceeds 999,999 km, and value will stay there and do not change any more.

#### **Average Fuel Consumption**



It displays the average fuel consumption since last resetting of the function.

If the average fuel consumption has not been reset for a long time, the cardinal number of average fuel consumption is big, and the displayed value tends to be stable.

### **Endurance Mileage**



It displays the approximate driving range that the residual fuel can sustain. The driving range is calculated as per the residual fuel volume and recent average fuel consumption. As it may be influenced by driving habits and driving routes, deviation from the driving range is normal. In actual driving, if the fuel level is low and the warning lamp is on, please add fuel timely even a longer driving distance is displayed on the driving range.

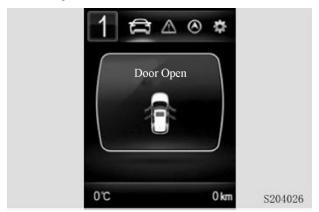
#### **Information**

#### **Reversing Radar**



Indicate the distance from the obstacle detected to the vehicle, until the alarm is removed.

#### **Door Open**



Indicate the closing status of four doors, engine hood and tail door. When any of the door is open, there will be prompt tone.

#### Tire Information %(if equipped)



Indicate tire pressure, tire temperature, and warning for insufficient tire pressure and overheating.

#### **Key Not Detected**



Please check whether the key is in the vehicle. When the key is in the vehicle, if the instrument still displays this information accompanied with prompt tone, it suggests that the key battery runs out. Then press the Lock button of the key, and check

whether the indicator lamp on the key lights up. If not, replace the key battery, so as to guarantee normal function of PEPS system.

# Depress Brake Pedal to Start \*\* (if equipped)



It reminds the driver to tread the brake pedal before starting the engine.

#### Shift to P Position %(if equipped)



The engine can only be started when the gearshift

lever is in P position.

#### Low Battery of Remote-Control Key



When the key battery is low, there will be prompt tone. Please contact a dealer authorized by Changan Automobile for inspection or replacement.

### **Navigation**



Display synchronizing navigation information.

#### **GPF** regeneration tips



The instrument prompts "GPF reaches the limit, please maintain", indicating that the GPF system needs maintenance. Please contact the authorized dealer of Changan Automobile for inspection or replacement.

# Battery power management **%** (if equipped)



Prompt that the battery is low, please start the engine immediately.

#### Smart scene \*\*(if equipped)



This option is used to exit the display interface of subtotal mileage, tire pressure information, short-term driving information, and long-term driving information.

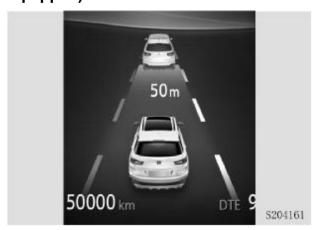
After entering the scene reconstruction option, short press OK to exit the current displayed information interface.

### Lane Assist System (if equipped)



Display lane line detection and Lane Assist system alarm information.

# Adaptive cruise control (ACC) % (if equipped)



Display the following information: time and distance interval, cruise speed and other information, and display the relevant reminders and alarms of the adaptive cruise system.

### Reversing radar alarm



When an obstacle is detected, the distance from the obstacle to the vehicle will be displayed until the alarm is released.

### **Text alarm or prompt**



Give text prompt or alarm to relevant system.

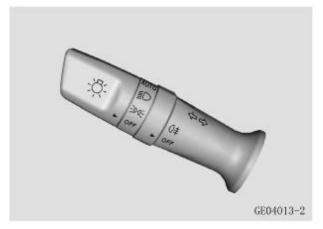
#### IACC function display \*\*(if equipped)



Prompt the owner to be in IACC assisted driving state, display the environment of the vehicle such as lane and front vehicle, and IACC alarm and prompt information.

# **LIGHT CONTROL**

# **Light Control Handle**



OFF: With the handle in OFF position, when vehicle power supply is in OFF/ACC position, all lamps go out; when vehicle power supply is in ON/START position, all lamps go out except the daytime running lamp.

: position lamp, license plate lamp.

headlamp, position lamp, license plate lamp.

AUTO  $\times$  (if equipped): With the handle in AUTO position, the headlamp will light up and go out automatically based on the ambient brightness.

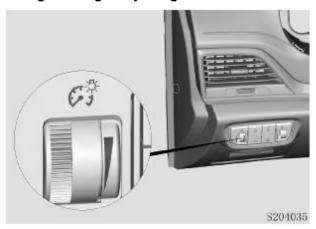
#### Note

The environmental brightness sensor is installed in the middle of the front defroster vent; please do not place any object here to block the sensor.

# Switch of Daytime Running Lamp **\***(if equipped)

When the vehicle power supply is in ON/START position and the light control handle is in OFF position, the daytime running lamp will be on.

#### **Background light adjusting switch**



Turn on the position light and turn the switch up / down to make the background light of the whole vehicle bright / dark gradually.

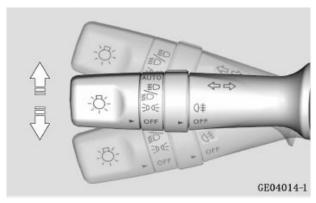
# Automatic Adjustment of Headlamp Beams \*\*(if equipped)

The system may keep the beams horizontal whatever posture the vehicle is in. It reduces the dazzling effect of the headlamp light on other road owners.

If the indicator lamp o instrument cluster keeps being on, it indicates a system fault. Please contact a dealer authorized by Changan Automobile for inspection.

After suspension replacement, contact a dealer authorized by Changan Automobile to check the headlamp beam direction automatic adjustment system and the direction of headlamp beans.

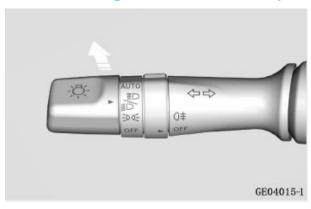
# **Turn Signal Lamp Switch**



Pull up/push down the light control handle when the power supply of vehicle is at ON position, and the right/left turn signal lamp flashes. If the light control handle is moved up or down shortly and then returned to the middle position, the turn signal lamp of corresponding direction flashes for 3 times.

Turn on a turn signal lamp, if it flashes twice fast as it usually does, it indicates a fault of the turn signal lamp.

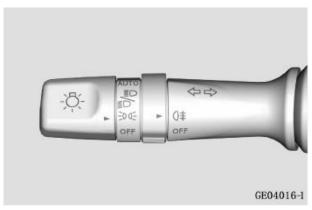
# **Switch of High/Low Beam Lamp**



Rotate the light control handle to , and the low beam lamp will light up. Push the light control handle forward now to turn on the high beam lamp.

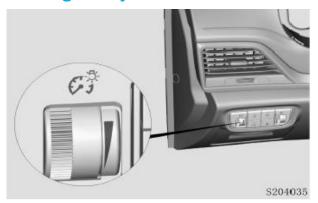
The high beam lamp flashes while the light control handle is pulled backward; when it is used during overtaking, the handle will return to original position as soon as the handle is released.

# **Fog Lamp Switch**



Rotate the light control switch to , and rotate the fog lamp switch counterclockwise to turn on the fog lamp.

# **Backlight Adjustment Switch**



Turn on the position lamp and pull up/press down the switch, the backlight of the whole vehicle turns brighter/darker.

## **Front Reading Lamp**

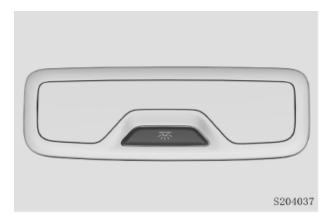


The front reading lamps consists of light-guide structural lamp (A), gear ambient lamp (B), door detecting switch (C), sunshade opening switch (D)  $\times$  (if equipped), ROOM switch (E), sunshade closing switch (F)  $\times$  (if equipped), reading lamp switch (G), microphone (H), sunroof switch (I), Glasses box (J), SOS switch (K) $\times$  (if equipped) and SOS indicator light (L, M)

Press the left/right reading lamp switch, and the reading lamp will light up. Press the switch again, and the lamp with go out. With vehicle power supply at ON/START position, the gear ambient lamp lights up; with power supply at OFF position, the gear ambient lamp goes out.

Door inspection: Press the door inspection switch. If any door is not closed at this moment, the lamp will light up; after all doors are closed, the lamp will dim out. Press the switch again to release the door inspection mode.

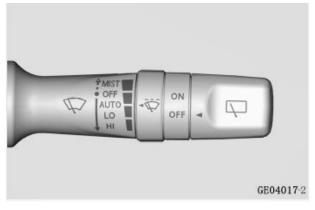
# **Rear Reading Lamp**



Press the reading lamp switch, and the reading lamp will light up; press the switch again, and the lamp with go out.

### **WIPER AND WASHER**

# **Wiper Control Handle**



The wiper control handle consists of windshield wiper switch, rear windshield wiper switch and operating interval adjusting ratchet.

## Windshield Wiper

MIST: Push the handle upward gently, and then let it return freely. The wiper wipes once.

OFF: The wiper stops operating.

INT: The wiper wipes intermittently/randomly.

LO: The wiper wipes at a normal speed.

HI: The wiper wipes at a high speed.

# Adjustment of Wiping Interval **\*** (if equipped)

With the handle rotated to a wider range, the interval becomes shorter gradually and the wiper wipes at a higher speed.

# Free Wiping \*(if equipped)

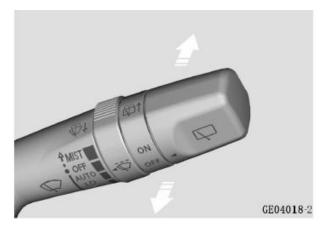
The wiping speed varies along with the rainfall amount automatically. With the handle rotated to a wider range, the sensitivity of rainfall amount detection drops to a lower level.

# **Rear Windshield Wiper**

OFF: The wiper stops operating.

ON: The wiper wipes intermittently.

#### Washer



#### Windshield Washer

Pull the wiper handle gently towards the driver, and the windshield washer starts to work. After the

washer stops working, the wiper continues to work for a short time.

#### **Rear Windshield Washer**

Push the wiper handle gently toward the direction opposite to the driver, and the rear windshield washer starts to work. After the washer stops working, the wiper continues to work for a short time.

If the washer does not work, please check the level of cleaning solution. If the cleaning solution is insufficient, please add as proper.

#### WARNING

It is strictly prohibited to operate the washer when the cleaning solution is insufficient, because this can damage the washer motor.

Do not operate the wiper blade if the windshield is dry, because this can scratch the window glass, damage the blade or burn the wiper motor.

Please confirm that defrosting has been carried out properly before operating the windshield wiper.

If the ambient temperature is below 0°C, please confirm that defrosting has been carried out properly before operating the washer; otherwise, the cleaning solution may be frozen on the windshield surface, which may affect the sight field.

#### AIR CONDITIONING SYSTEM

# **General Description**

#### **External Air**

To ensure that the air conditioning system can work normally, please confirm that the air vent in front the windshield and that of the air conditioning system are free of sundries such as snow and leaves.

#### **Internal Air Circulation**

Long-time internal air circulation can cause window frosting. Please do not activate the internal air circulation mode when the dehumidifying & defogging function is ON.

After activating the internal air circulation mode, please do not smoke, as the smog will deposit on the evaporator and generate an enduring odor.

#### Heating

The heating system may maximize its heating performance only after the engine reaches the normal working temperature. It is suggested to divert the air flow to the footwell and to the windshield when the window fogs.

#### Cooling

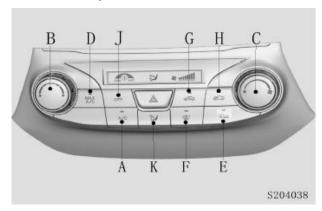
Using the air conditioning system will increase fuel consumption.

The air cools down as it passes through the evaporator, and moisture in the air is absorbed to avoid window fogging. The condensate generated as the result will be discharged to the outside. Therefore, it is normal to find a small ponding under the vehicle.

It is suggested to divert the air flow to the face and then activate the internal air circulation mode.

# **Manual Air Conditioning Control System**

#### **View and Operation of Control Panel**



#### A. Refrigeration Switch A/C

Press the switch to manually active or inactivate the cooling function of air conditioner. It works only when the engine and the blower are in operation.

#### **B.** Temperature Adjustment

Rotate the knob to adjust the air temperature inside vehicle. The red area refers to hot air and the blue area refers to cool air.

#### C. Air Volume Adjustment

Rotate the knob to adjust the air volume to a desired level. Rotate the knob clockwise to increase the volume and counterclockwise to decrease the volume.

# D. Maximum Refrigeration 776

Under this mode, the air conditioner will operate with the maximum refrigerating capacity to reduce the temperature as soon as possible. Operate any switch or knob for refrigeration, mode changing, internal and external circulation to exit this mode.

# Rear Windshield Heating



Press the button, and the indicator lamp lights up, indicating activation of the rear windshield heating and the exterior rearview mirror heating. Defrosting and defogging will function for a preset period (about 14 min), and then turn off automatically. To inactivate the function manually, press the button again.

#### F. Defrosting & Defogging \(\psi\)



Press the button, and the indicator lamp of refrigeration switch lights up. The defrosting and defogging of windshield is now activated. The air volume is defaulted as Level 5, and the external circulation is ON. The defrosting performance can be improved by increasing the temperature and the air volume.

#### G. Internal Air Circulation

Press the button to switch to internal air circulation. and the air circulates around inside the passenger compartment.

#### **WARNING**

Long-time internal circulation can lead to foul air and low oxygen content inside vehicle, so please open the door window for ventilation as necessary.

#### H. External Air Circulation



Press the button to switch to external air circulation. and the air outside the vehicle enters the passenger compartment.

#### **CAUTION**

To make sure there is always fresh air inside the vehicle, use external circulation as much as possible when the air conditioner is not operating, so as to minimize the fogging of window.

With external circulation activated, if the temperature switch is adjusted to the red position, the air comes out hot; if the switch is adjusted to the blue position, the air comes out at normal temperature. If it is not too cold, the external circulation and food mode may be activated for foot warming.

With external circulation activated, outside odor would enter the vehicle more easily. It is recommended to switch to internal circulation when the vehicle is in area with heavy dust and poor air quality.

## J. Air Conditioning System OFF

Press the button to turn off the air conditioning system and put it into standby mode. The screen will display air supply mode and the internal/external circulation indicator lamp will light up.

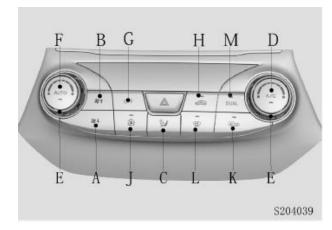
## K. Mode Regulation 🞾

Press the button to select among 4 air supply modes, namely:

- a. Face: The air comes out from the central vent and the side vent.
- b. Face and foot: Air comes out from the central vent, the side vent and the footwell vent.
- c. Foot: Air comes out mainly from the footwell vent.
- d. Foot and windshield: Air comes out from the windshield defrosting vent, the side defrosting vent and the footwell vent.

## **Automatic A/C Control System**

## **View and Operation of Control Panel**



## A. Air Volume Down 😽 🖡

Press the button (to Position 1) to decrease the air volume. The current air volume will be displayed on the screen.

## B. Air Volume Up \*1

Press the button (to Position 8) to increase the air volume. The current air volume will be displayed on the screen.

## C. Mode Regulation 😼

Press the button to select among 4 air supply modes, namely:

- a. Face: The air comes out from the central vent and the side vent.
- b. Face and foot: Air comes out from the central vent, the side vent and the footwell vent.

- c. Foot: Air comes out mainly from the footwell vent.
- d. Foot and windshield: Air comes out from the windshield defrosting vent, the side defrosting vent and the footwell vent.

## D. Refrigeration Switch A/C

Press the switch to manually active or inactivate the cooling function of air conditioner. It works only when the engine and the blower are in operation.

## E. Temperature Adjustment

Rotate the left/right temperature knob to adjust the air temperature of the left/right area inside the vehicle. Rotate the knob within the red area on the right side to have hot air of desired temperature, and within the blue area on the left side to have cool air. The temperature setting is displayed in the screen simultaneously.

## F. Automatic Mode AUTO

Press the button to select the automatic mode, under with the system adjusts the temperature, air volume, air mode automatically, and achieves and maintains the temperature set before.

With AUTO mode on, press any button for refrigeration, air volume adjustment, mode change, circulation mode change, and the system will exit automatic mode, but the rest functions will still stay in automatic mode.

## G. Air Conditioning System OFF

Press the button to turn off the air conditioning system, and the system will enter standby mode. The screen will display air supply mode, and the indicator lamp of internal/external circulation will light up.

## H. Internal Air Circulation San

Press the button to switch over between internal and external air circulation. With internal circulation on, the indicator lamp on the button lights up, and the air circulates around inside the passenger compartment.

#### **CAUTION**

To make sure there is always fresh air inside the vehicle, use external circulation as much as possible when the air conditioner is not operating. With external circulation activated, if the temperature switch is adjusted to the red position, the air comes out hot; if the switch is adjusted to the blue position, the air comes out at normal temperature. If it is not too cold, the external circulation and food mode may be activated for foot warming.

With external circulation activated, outside odor would enter the vehicle more easily. It is recommended to switch to internal circulation when the vehicle is in area with heavy dust and poor air quality.

## **WARNING**

Long-time internal circulation can lead to foul air and low oxygen content inside vehicle, so please open the door window for ventilation as necessary.

## J. Anion Generator 4



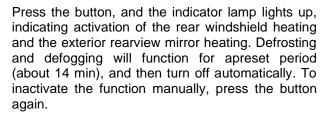
Press the button, and the indicator lamp lights up, and then the anion generator starts to work.

## K. Defrosting & Defogging W

Press the button, and the indicator lamp of

refrigeration switch lights up. The defrosting and defogging of windshield is now activated. The air volume is defaulted as Level 5, and the external circulation is ON. The defrosting performance can be improved by increasing the temperature and the air volume.

## L. Rear Windshield Heating Imm



#### M. DUAL Zone Switchover Button

Press the button or operate the temperature adjusting button +/- on the front passenger side, and the system will enter DUAL Zone mode with the indicator lamp lighting up. Under this mode, it is possible to set the temperature values for the left and the right areas separately. Press the button again, and the system will switch back to single zone mode with the indicator lamp going out. The temperature setting of the driver side will dominate.

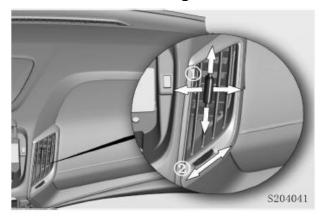
## **Adjustment of Air Vent**

#### Air Vent



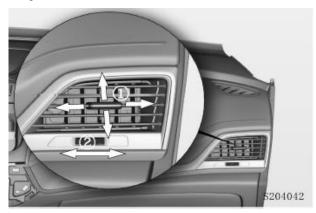
Α	Side defrosting air vent		
В	B Central air vent		
С	Windshield defrosting air vent		
D	D Side air vent		
Е	Front footwell air vent		
F	Rear footwell air vent		
G	G Rear face-mode vent		

## **Central Air Vent Setting**



- ① : Adjust the damper upward or downward, leftward or rightward to change the air direction.
- ②: Toggle the damper leftward or rightward to open/close the air vent

## **Adjustment of Side Air Vent**



① : Adjust the damper upward or downward, leftward or rightward to change the air direction.

②: Toggle the damper leftward or rightward to open/close the air vent

## **Rear Air Vent Adjustment**



- ① : Adjust the damper upward or downward, leftward or rightward to change the air direction.
- ②: Toggle the damper leftward or rightward to open/close the air vent

# **Instruction for Operation of Air Conditioning System**

To reduce odors generated during operation of the air conditioning system, operate as per the following steps:

- 1. Keep the engine running;
- 2. Press the cooling switch to turn off the air conditioning system;
- 3. Keep the fan running and ensure that the air supply volume is at a high-level;
- 4. Set the temperature to the highest value;
- 5. Select external air circulation mode:
- 6. Wait for about 3~5 min and then shut down the engine.

# **CS55**

## **Quick Heating**

	Manual Air Conditioner System	Automatic Air Conditioner System
1	Set the air volume to level 8.	Press "AUTO" button.
2	Turn the temperature knob to the highest level.	
3	Divert the air flow to the footwell	

## **Quick cooling**

Manual Air Conditioner Syste	Automatic Air Conditioner System
1 Press "MAXA/C" button.	Press "AUTO" button.

## **Defrosting**

Manual Air Conditioner System		Automatic Air Conditioner System	
1	Press defrosting & defogging button.	Press defrosting & defogging button.	
2	Improve cleaning efficient by increasing temperature and air volume.	Improve cleaning efficient by increasing temperature and air volume.	

## **Defogging**

	Manual Air Conditioner System	Automatic Air Conditioner System
1	Press defrosting & defogging button.	Press defrosting & defogging button.
2	Adjust the temperature based on the riding comfort.	Adjust the temperature based on the riding comfort.

## **MULTIMEDIA SYSTEM**

## **General Description**

#### Radio

If the vehicle is out of the effective range, radio signals will become weak. Tall buildings or mountains will affect receiving of radio signals.

Activating the rear defrosting function may affect receiving of radio signals too.

Wind, rain, thunder, lightning etc. may cause abnormal radio wave in propagation, poor radio reception or even failure of receiving.

If the vehicle is in an area within the overlap of two stations of the same or similar frequencies, the signals of the two stations will interfere with each other.

Replacement of radio antenna without permission may result in malfunction or even damage of the radio.

#### **USB** Interface

It is used to connect external devices. Poor contact of or poor compatibility with the USB interface may lead to data reading failure, play pauses or play dragging.

As various USB memorizers are available in the market, it cannot be guaranteed that all memorizers can be connected successfully to the USB interface of the vehicle.

#### **Others**

Functions of in Call system may be activated under the precondition that the valid Bluetooth and WLAN connection are set between cellphone and onboard terminal service system.

The driver shall not watch video and shall operate the host device carefully during driving, so as to avoid violating the traffic regulations and avoid traffic accidents.

It is not suggested to make phone calls to or with on-board terminal phone inside the vehicle, as there may be echo, sound distortion and other problems caused by the mutual interference between audio power amplifier and phone.

For safety and normal operation of the product, never remove or maintain the host device without permission; otherwise there may be damage or accident. Contact a dealer authorized by Changan Automobile for details.

Please register with your personnel information before using in Call. Failing to so, you will only have access to local music, video, radio and picture of the system, and you cannot use other functions.

## **Multimedia Controller (in Call)**



## **Description of Panel**

[<sup>1</sup>]: HOME

Tap to return to HOME page.

[ ]: previous song/rewind

Press shortly: Search radio stations backward/previous song;

Long press: Rewind.

(b): turn on/off/volume adjustment

Press shortly: turn on/mute/unmute.

Long press: Turn off.

Rotate: Adjust the sound volume. Rotate clockwise to increase the volume or counterclockwise to reduce the volume.

[ ]: next song/fast forward Press shortly: Search radio station forward/next song;

Long press: Fast forward.

[ ]: push-to-talk

Click to call TSP background dealer directly. To use this function, an active Bluetooth connection shall be set up between cellphone and in Call.

## **External Device Disclaimer**

#### Bluetooth Disclaimer

Version of the Bluetooth terminal installed on the vehicle is 4.0, and the terminal supports A2DP, HFP, AVRCP, PBAP, SPP, HID, GATT, PXP, LLS, and TIP protocols.

The terminal supports phones which are prevalent in the market and compatible with 4.0-version Bluetooth, including Apple, Samsung, Nokia, Huawei, HTC, MI, etc.

As various versions of Bluetooth are available, we cannot guarantee that Bluetooth terminal of the vehicle supports Bluetooth connection with all phones.

#### **WLAN Disclaimer**

The terminal supports phones which are prevalent in the market and equipped with WLAN function, including Apple, Samsung, Nokia, Huawei, HTC, MI, etc.

As various versions of WLAN terminals are available, we cannot guarantee that the WLAN terminal of the vehicle supports WLAN connection with all cellphones.

## **Home Page**

## **Prompt of Power On**

After the on-board terminal is started, there will be welcome interface and disclaimer on the screen as shown below:





Tap [OK] to accept, and the system will enter the main interface.

## **Main Interface**



In the main interface, you can use various functions, such as radio, multimedia, Bluetooth music, navigation % (if equipped), phone call, voice recognition % (if equipped), Baidu CarLife, quick navigation, panoramic view%(if equipped), system upgrading, map revision, file management, information system, individuation and setting.

# **Description of Prompt on Top of Interface**

: Return to HOME page.

: Indicate new message received.

: Indicate WLAN ON, and the signal strength.

: Indicate Bluetooth ON, and the connection status.

Indicate mute status.

**USB Loading...**: Indicate loading status during loading of data source.

FM2 87.70 MHz : Scrolling display song/radio information.

Indicate play/pause state.

: Indicate power status of device when Bluetooth connection is set.

: Indicate signal strength of device when Bluetooth connection is set.

## **Description of Quick Menu**

Draw the screen downwards to see the quick menu. There are two interfaces of the quick menu, for ON/OFF status and information.

With ON/OFF menu, operation on ON/OFF status of WLAN and Bluetooth, as well as detailed settings can be done quickly. It is also possible to enter the main play interface of current medium source, or set the sound volume and brightness directly.



All system notifications (e.g. file transmission done, malfunction warning, etc.) will be displayed in notification column. You can also clear/clear all information in the bar.



## Radio

Search, scan and play radio.



**Band**: Switch among FM1/FM2/FM3/AM1/AM2 in cycle.

: Click once to select the current station, and long press to put it in Favorite.

: Click to listen to the previous/next station.

: Tap or slide to select a station directly.

: Search for station forward/backward.

■: Play/pause

## Multimedia

Play music, video and picture via USB/Local Storage/Bluetooth. Click the source to switch over.



Supported formats of audio files: AAC, MP3, MP2, WAV, WMA, AIFF, OGG, AMR, APE, AU, FLAC, M4A, M4R, MKA, MMF and WV

Supported formats of video files: WMV, F4V, FLV, MP4 (MPEG2/4/AVC), MOV, MPG, 3GP (H.264), AVI (MPEG2/4/AVC), MKV (MPEG2/4/AVC), RMVB, TS and VOB

Supported formats of image files: JPG, JPEG, BMP, PNG and GIF (only the first static frame)

## 1. Local Storage

Tap "Local Storage" to enter the music play interface. Click the list to choose audio/video/image file to play.

In audio/video play interface, operations like Play/Pause, Previous One/Next One, progress adjustment and play mode switchover can be done.

Slide the screen leftwards or rightwards in audio interface to switch over between the main interface and the lyric interface.

: Play/Pause

Display play progress; you can tap or drag the progress bar to skip.

Previous One/Next One

: Switch over among modes of "Repeat All", "Repeat One", "Folder Random" and "Repeat Folder".

**3D Audio**: AM 3D audio switch, which is used to turn on/turn off 3D audio.

Tip: When the vehicle is running, a prompt message of "No Video" will pop out if there is any operation involved with video play.

In image interface, operations like Previous One/Next One, Zoom in/Zoom Out can be done. Slide the screen leftwards or rightwards to check the previous image or the next image.

Click to switch over between slide show mode and single view mode. In slide show, the interface switches at an interval of 3 s.

Q /Q : Zoom in/ out.

#### 2. USB

Connect a USB device. If any valid file exists, the system will skip to USB interface automatically to play such file.

Please see descriptions given in Local Storage for functions of audio/video/image in USB.

#### 3. Bluetooth Music

This is available under Bluetooth connection condition. You may use the following functions on the Bluetooth music interface: Play/Pause, Previous Song/Next Song, Sound Effect etc.

#### **CAUTION**

At present, Bluetooth music function supports the original player installed on cellphone, and the third-party players may be incompatible.

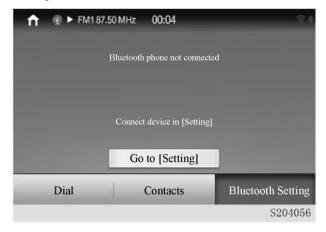
## **Phone**



Please do not make any call or connect your cellphone to the Bluetooth terminal during driving.

## **Bluetooth Setting**

Check Bluetooth connection, and quickly enter the setting interface to activate/inactivate Bluetooth.



#### **Bluetooth Connection Procedure:**

- 1) Turn on Bluetooth switch of the on-board terminal (the Bluetooth is ON by default).
- 2) Use cellphone to search "CHANGAN", the Bluetooth name of the on-board terminal.
- 3) Connect the cellphone to the Bluetooth of the on-board terminal, and conduct matching.
- 4) Bluetooth connection is done.

#### CAUTION

When a high-power electrical appliance is near the in CALL device, or the cellphone is covered with metal material, the Bluetooth communication will be disturbed or even cut off.

The Bluetooth system may fail to work if the cellphone battery is low.

#### Dial

The system can switch to dial interface under Bluetooth connection. The system supports dialing by inputting number and calling back from the call records. Number inputting mode supports intelligent searching.



Click the "Answer" button or button on steering wheel to answer the phone. Click the "Refuse" button or button on steering wheel to hang up

the phone.

#### **CAUTION**

Under the following conditions, the person one the other end of the call may not hear the Bluetooth phone call:

- The vehicle is running on an unpaved road (due to the traffic noise);
- The vehicle is running at a high speed (because the communication signal is affected);
- The vehicle window or sunroof is open;
- The air vent of air conditioner is directed to the microphone;
- The noise made by the air conditioner fan is loud:
- The vehicle is under a high-voltage cable, or close to a substation or launching tower.

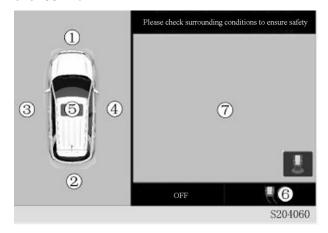
#### 3. Contacts

Input the name or phone number of the desired contact in the input box, search in the "Contacts", and choose one contact to call.



## Panoramic View %(if equipped)

In this mode, owner may turn on/off the view, turn on/off the auxiliary lines and switch over the view. It exits panoramic interface when the vehicle speed is over 30 km/h.



Owner may choose visual angel of Front/Rear/Left/Right/Both Sides (①-⑤) by clicking, or turn on/off the auxiliary lines (⑥), or check the enlarged view (⑦).

## **System Upgrade**

Click "System Upgrade" in HOME page to check the version information and available upgrading.



The system upgrade supports upgrading via USB and WLAN. When necessary, the system will reboot to complete upgrading.

- 1) Upgrading via USB: The system needs to access a USB device that contains an upgrade package. After the system has detected the upgrade package successfully, please tap the "Upgrade" button and then carry out system upgrade step by step as per the instructions on the interface.
- 2) Upgrading via WLAN: With network connection, if the system detects a new upgrade package available in the backstage server, tap the "Upgrade" button, and then carry out system upgrade step by step as per the instructions on the interface.

#### **CAUTION**

• During upgrading, please do not cut off the power. We suggest parking the vehicle properly and keep the engine running normally to avoid automatic shutdown due to low battery power.

- During upgrading via USB, please do place the upgrade package in the root directory of the USB device.
- Before upgrading via WLAN, please first confirm that the WLAN network is connected and stable; otherwise you may fail to download the upgrade file, resulting in upgrading failure.

## **File Management**

It calls out File List interface of Local Storage by default. Owner may choose file/folder for operations like copy/delete/play. For external storage, owner can only copy files/folders to local storage for further operation like selecting and play.



## Individualization

Owner can set wallpaper in individualization interface. Owner may choose the theme/wallpaper of the system, and also choose picture from USB memory to set it as theme/wallpaper.



## **Setting**

Owner may conduct setting of system, audio and vehicle.

## **System Setting**

1) Display

Owner can conduct settings like Screen OFF, Daytime/Night Mode, Video Play during Driving, Time Format, Brightness.

When the screen is turned off, tap any area of the screen to recover screen display.



#### 2) Sound

Owner can mute and unmute the keypad tone, or set the sound volume of media/system/call/navigation.



## 3) Language selecting

Owner may set the system in Chinese or English.



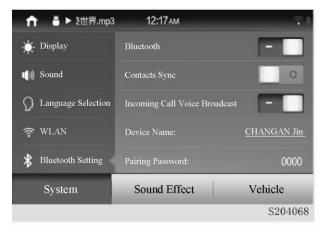
#### 4) WLAN network

Owner may activate or inactivate WLAN network. With WLAN activated, there will be a list of available networks for connection and disconnection.



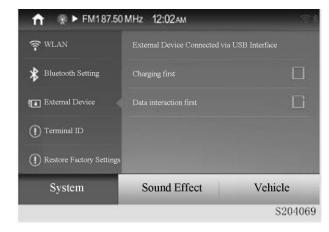
#### 5) Bluetooth setting

Owner may turn on or turn off Bluetooth, contact synchronization, voice broadcast of incoming call; enable or disable reveal of the device name, and edit the name; or connect, disconnect, even delete the matched device.



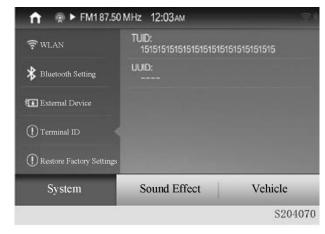
#### 6) External device

Owner can set the priority of external devices connected via USB for charging/data interaction.



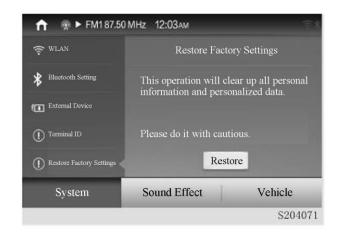
#### 7) Terminal ID

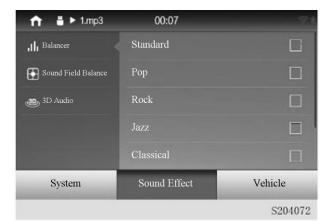
Display TUID and UUID value.



## 8) Restore factory settings

Tap the button to reset. After confirmation, the system will start factory reset processing.





## **CAUTION**

To restore factory settings, please never cut off the power supply.

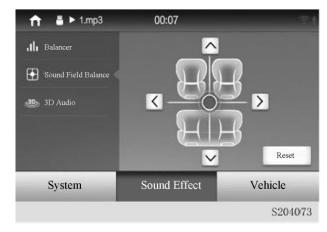
## **Sound Setting**

## 1) Balancer

Owner can choose among modes of standard, popular, rock and roll, jazz, classical and voice, or enter "Customize" interface to set high-pitch/mediant/bass.

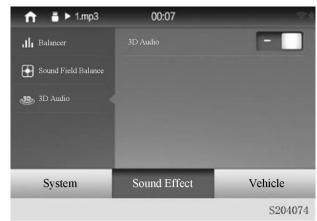
#### 2) Sound field balance

Owner may click or drag to set the balance. The sound field will return to the center after reset.



#### 3) 3D audio

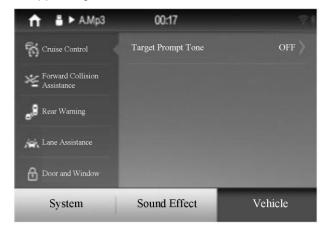
It supports bass effect of 3D audio.



## **Vehicle Setting**

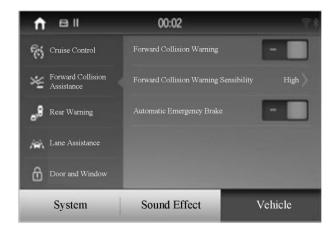
1) Cruise control % (if equipped)

Owner can choose the prompt tone against target: off, prompt for recognition only, prompt for disappearing only, prompt for recognition and disappearing.



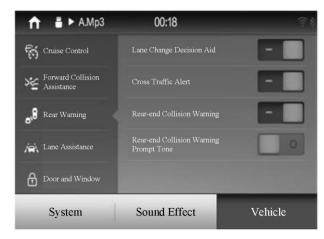
2) Forward Collision Assistance % (if equipped)

Owner can conduct setting of Forward Collision Assistance/Automatic Emergency Brake ON/OFF and Front Collision Warning Sensitivity.



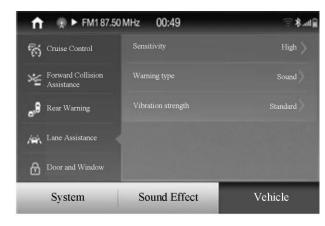
3) Rear Warning % (if equipped)

Owner can conduct settings of Lane Change Decision Aid/Cross Traffic Alert/Rear-end Collision Warning/Rear-end Collision Warning Prompt Tone ON/OFF.



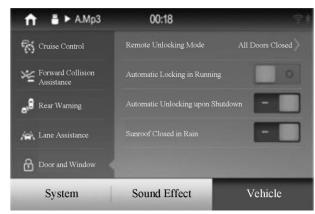
4) Lane assistance % (if equipped)

Owner can set the sensitivity/warning type/vibration strength.



5) Door and Window % (if equipped)

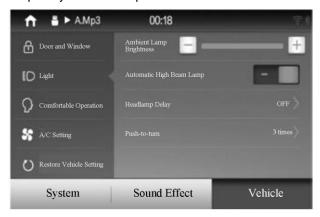
Owner can choose the remove unlocking mode of window, like automatic locking in running, automatic unlocking upon shutdown, enabling/disabling of sunroof closed in rain.



The "Automatic Locking in Running" is set as "Disabled" by default, and it can be enabled only after unlocked by 4S store.

#### 6) Light \* (if equipped)

Owner can set the brightness of ambient lamp, ON/OFF status of automatic high beam lamp, as well as the delay, lighting duration and push-to-turn frequency of headlamp.



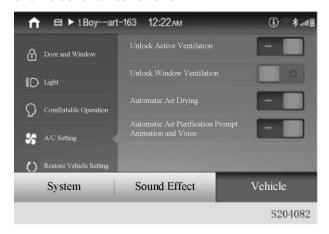
#### 7 Comfortable operation (if equipped)

Owner can set automatic folding of rearview mirrors, ON/OFF status of rear wiper assistance for reversing.



#### 8) Air conditioner setting % (if equipped)

Owner can set the ON/OFF status of Unlock Active Ventilation, Unlock Window Ventilation, Automatic Drying, Automatic Air Purification Prompt Animation and Voice for air conditioner.



Unlock active ventilation: It starts when the vehicle is started by remote key to supply fresh air to the vehicle.

Unlock window ventilation: Long press the unlock button of the remote key to enable the function, so as to supply fresh air to the vehicle (it is suggested to enable the function in 4S store for better ventilation effect).

Automatic drying: It starts when the vehicle is locked for a while to dry the air conditioning system (only when the refrigeration is on).

Automatic air purification prompt animation and voice: Turn on/turn off the prompt for air purification.

#### 9) Restore vehicle setting



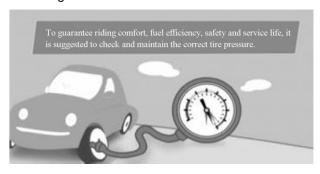
## **Operation Instruction of in Call**

This interface provides operation instructions of in Call application.



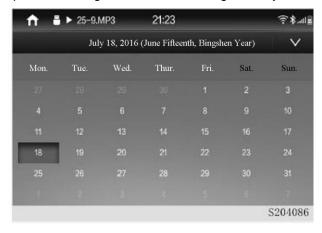
# **Common Knowledge on Vehicle Use**

This interface provides instructions for common knowledge on vehicle use.



#### Calendar

The system supports to display the solar calendar, lunar calendar and week. It also supports switchover between Last Month and Next Month, quick searching of date and returning to today.



# PARKING ASSIST SYSTEM **\*\*(IF EQUIPPED)**

## A

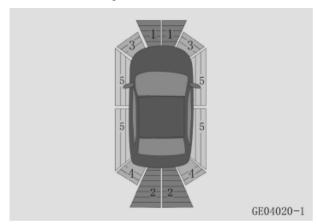
#### DANGER

The parking assist system is only an auxiliary tool and cannot substitute observation. For safe vehicle moving/parking, the driver must keep alert to everything around the vehicle and ensure that the vehicle will hit no person, animal or other objects.

## **Reversing Warning**

Reversing warning is an electronic parking assist system with ultrasonic sensors. It uses sensors to detect the situation around the vehicle and provides visual message and sound to inform the driver of the distance between the vehicle and the object detected.

After the front sensor and rear sensor detects obstacle, it beeps at different frequencies. Pay attention to distinguish the sound.



1. Detected by front middle sensor  $\times$  (if equipped)

- 2. Detected by rear middle sensor
- 3. Detected by front corner sensor  $\times$  (if equipped)
- 4. Detected by rear corner sensor
- 5 Locating and tracking based on vehicle movement and sensor detection used before % (if equipped)

## Reversing Radar Switch \*(if equipped)

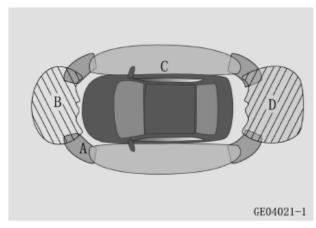
Reversing radar switch only applies to the front system.

With vehicle power supply at ON position, reversing radar front system is turned on by default, and the indicator lamp on the reversing radar switch does not light up;

Press the reversing radar switch, and the indicator lamp on it will light up, and the front system will be turned off; in case any fault of the system, the fault information will be displayed on the instrument for 3 seconds;

Press the reversing radar switch again, and the indicator lamp on it will go out, and the front radar will be turned on.

## **Detection Scope of Sensor**



Α	About 60 cm	
В	About 100 cm	
С	About 60 cm	
D	About 150cm	

The maximum detection distance of the sensor varies as the size of the obstacle varies. For small obstacles such as a pole and a traffic sign, detection distance of the sensor may be less than 150 cm.

#### CAUTION

The reversing radar may not be able to detect the following objects:

- Slim objects such as electronic wire and rope.
- Objects absorbing sound wave such as cotton and snow.
- Object with sharp edges.
- Tall object with the upper part protruding
- Short object.

The reversing radar is blind to certain areas and spots:

- Lower limit of the detection range: objects such as children and animals.
- Upper limit of the detection range: objects such as loaded goods that suspend outward and tail of a truck.

The reversing radar may fail to work normally under the following conditions:

- The bumper is damaged.
- The sensor or accessories are violently collided.
- There are other accessories within the sensor detection scope.
- The sensor surface is covered with objects or sundries such as snow, mud, moisture or water droplets.
- The vehicle is tilted.
- The weather is extremely hot or cold.
- The vehicle is running on a rough road.
- Ultrasonic wave source exists around the vehicle such as horn blowing of other vehicle and air brake sound of a truck.
- The vehicle is equipped with radio antenna, protective pillar and towing/lifting hook.
- The vehicle is running toward a high road shoulder or right-angled shoulder.
- The obstacle is very close to the sensor.

If any of following conditions occurs, please contact Display of Warning a dealer authorized by Changan Automobile:

- reversing radar fault is displayed on the screen, will keep being on. which cannot be removed after the
- Sundries are removed off the sensor.
- The system gives an alarm when no obstacle existing around the vehicle.
- The system gives no fault prompt or alarm when faced with an obstacle.

When a sensor is damaged, the system will give a fault prompt and an alarm.

If an obstacle exists within the detection scope, relevant warning indication bar will light up and a warning The ignition switch is in "ON" position, the sound will be generated. As the vehicle gets closer to the obstacle, the warning sound will go on with a shorter reversing radar makes a blow lasting for 3s, and a interval; when the distance between the vehicle and the obstacle becomes less than 30 cm, the warning sound

> Based on the approximate distance from vehicle to obstacle, there are be three different colors of indicator strips at the most behind the vehicle. At the front and rear corners, and the left and right sides of vehicle, there are two different colors of indicator strips.

Warning area Target grade	Front/rear side sensor (cm)	Front/rear corner sensor (cm)	Front middle sensor (cm)	Rear middle sensor (cm)
3 (Green)	-	-	60- 100	60- 150
2 (Orange)	30- 60	30- 60	30- 60	30- 60
1 (Red)	≤30	≤30	≤30	≤30

#### **Front Sensor**

The front sensor works only when the vehicle speed is less than 15 km/h. It detects the approximate distance from the front end of vehicle to the obstacle at a certain angle;

If the gearshift lever is in P (parking) position or the reversing radar switch is turned off, the front sensor cannot work;

When the vehicle is decelerating, the front sensor can resume only if the speed drops to less than 8 km/h.

#### **Rear Sensor**

The rear sensor will work only when the gearshift lever is in R (reversing) position. It detects the approximate distance from the rear end of vehicle to the obstacle at a certain angle.

## **Side Distance Warning**

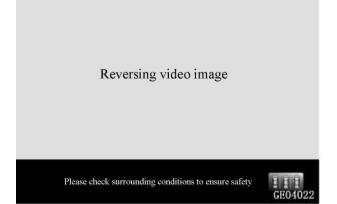
The front/rear side sensors can monitor the area inaccessible to the front and rear sensors, so as to achieve side distance warning. The system records the obstacles detected and calculates the real-time running track of vehicle to distinguish relevant and irrelevant obstacles. When the side edge of vehicle gets too close to an object, the driver will see the warning information from the display.

With the front system of reversing radar OFF, the front sensor does not work, and partial functions of side distance warning are disabled.

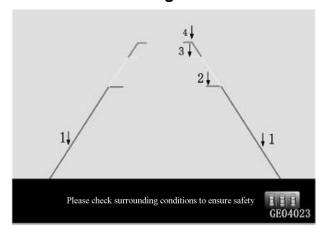
## **REVERSING CAMERA**

Reversing camera is a visualized parking assist tool. It is a system which uses a camera installed at the tail end of vehicle to shoot views behind and then displays such views on the screen inside the vehicle.

When the ignition switch is not at OFF position and the shift lever is in R position, the screen will display reversing video image, safety tips and parking assist mode switch. Tap the parking assist mode switch to circularly switch among three status: reverse stall parking  $\rightarrow$  parallel parking  $\rightarrow$  guide line off.

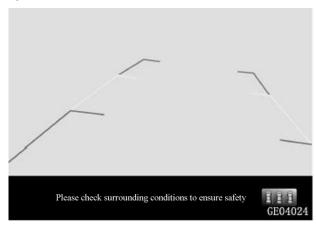


## **Reverse Stall Parking Mode**



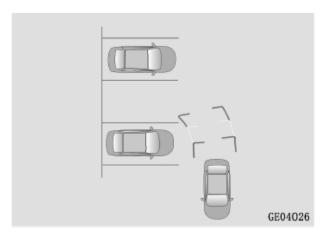
- 1. Spoke extension line: Taking the bumper as the reference, it refers to the vehicle width including the exterior rearview mirrors when the steering wheel is not rotated (in static).
- 2. Red reference line: It is about 1 m from the rear bumper of the vehicle.
- 3. Yellow reference line: It is about 2 m from the rear bumper of the vehicle.
- 4. Green reference line: It is about 3m from the rear bumper of the vehicle.

Rotate the steering wheel, and the spoke extension line and reference lines (collectively called as dynamic track) will change based the steering wheel angle. Estimate the reversing track of vehicle at the angle. After it is confirmed that the dynamic track meets the reversing intention, hold the steering wheel and back up the vehicle along the dynamic track.

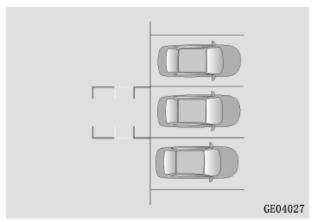


## **Examples of Reverse Stall Parking**

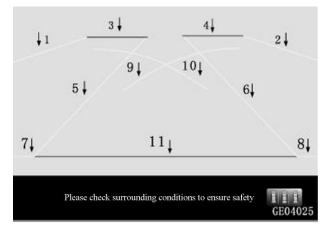
1. Find the parking spot and drive to the position shown in the figure below. Shift to R position and select the reverse stall parking mode.



- 2. Rotate the steering wheel and pay attention to the dynamic track. When the steering wheel angle is suitable for reversing, hold it still and back up the vehicle. The steering wheel may be adjusted based on the actual situation in reversing.
- 3. When the vehicle body is parallel to the parking spot, turn the steering wheel to the original position to adjust the vehicle position and finish parking.



## **Parallel Parking Mode**

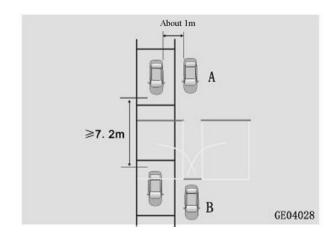


- 1. Directing line for parallel parking (1, 3, 5, 7 or 2, 4, 6, 8);
- 2. Yellow reverse guide line (9, 10);
- 3. Red distance reference line is about 30 cm (11) from the rear bumper of the vehicle.

## **Examples of Parallel Parking**

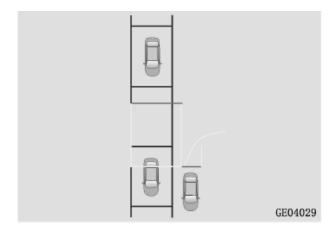
Take right-side parking as an example.

1. Find a parking spot, and then drive from A to B position. Shift to R position and select parallel parking mode.

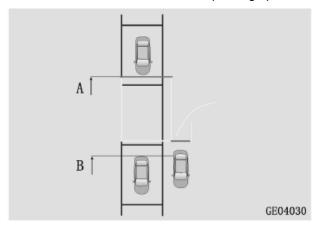


#### **CAUTION**

- Keep vehicle parallel to the parking spot when drive to B position. The distance between the vehicle and the vehicle at side shall be about 1 m.
- The length of the parking spot shall be at least 7.2 meters; otherwise it is impossible to park the vehicle in this logic.
- 2. Turn on the right turn signal lamp (turn on the left turn signal lamp if the parking spot is on the left side), and the right directing line and the reverse guide line will be displayed on the screen.



3. Reverse slowly until the red directing line reaches the obstacle in the rear of parking spot.



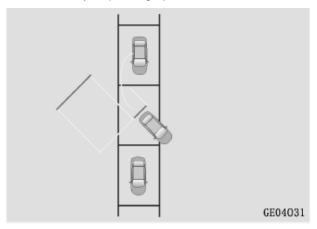
- A: The red directing line reaches the barrier at rear
- B: The rear wheels of the vehicle go across the tail end of vehicle at side

#### **CAUTION**

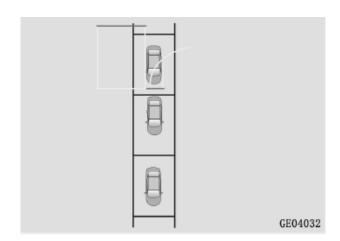
Be careful with the vehicle at side. If the rear wheel of your vehicle surpasses the tail end of the vehicle

at side, it means that the length of parking spot is less than 7.2 m, and there is a risk of scratch.

4. Turn the steering rightwards to the end (or turn the steering leftwards to the end if the parking spot is on the left side), and continue to reverse slowly until the reverse guide line is tangent to the inner side boundary of parking spot.



5. Turn the steering wheel in opposite direction to the end and release the brake pedal to reverse slowly until the vehicle is parallel to the inner side boundary of parking spot. Then adjust the vehicle position and finish parking.



## **Guide Line Off Mode**

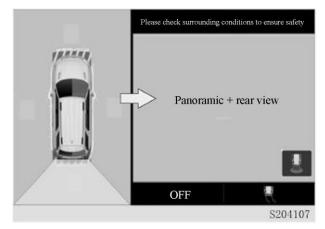
When the park assist mode is "Guide Line Off", the screen only displays reversing video image, safety tips and park assist mode switch and do not display any auxiliary line.

# PANORAMIC IMAGE SYSTEM \*\*(IF EQUIPPED)

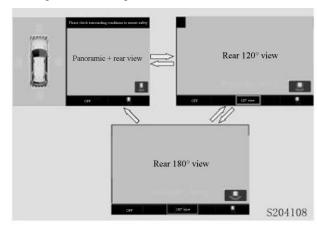
With vehicle power supply at ON position and vehicle speed less than 30 km/h, press Panoramic button or the Panoramic icon of in Call interface, or shift to R position to call out panoramic view. Press the Panoramic button again, or click [OFF] icon of panoramic interface, or shift out from R position for one minute, or raise the vehicle speed over 30 km, the panoramic view will be gone.

#### **Panoramic Interface Switchover**

With the panoramic view on, click any area at front/rear/left/right/both sides to switch to the interface with both panoramic view and corresponding single view.



In interface with both panoramic view and single view, click the single view on the right side to switch to full screen interface of the single view. With the full screen of single view on, click the 180° View/120° View icon on the screen to switch over among the view angles.



## **Parking Guide Line Switch**

With panoramic view/single view on, click button of parking guide line switch to turn on/off the guide lines. There is no parking guide line for front/rear 180° view.



#### **CAUTION**

 Make sure the width of parking spot is more than or at least equal to that of spoke extension line.

## AUTOMATIC PARKING ASSIST (APA) \*\*(IF EQUIPPED)

Automatic parking assist system has four functions, namely parallel parking, vertical parking, diagonal parking and leaving. The system measures the lengths of the parking spots on both sides of the road and maps out the parking track to the chosen spot. During the process, owner only needs to operate the gearshift lever, brake pedal and accelerator pedal for auxiliary.

## DANGER

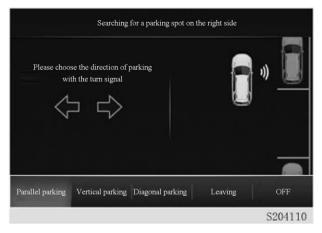
Automatic parking assist system cannot apply active brake or respond to sudden change of the parking spot (such as sudden movement of adjacent vehicles or intrusion of people/object). It cannot detect or bypass the vehicles coming from the rear or the left and right sides either. During the parking process, please always be sure that the parking spot is available and prepare to apply active brake.

Only under the condition that the electronic stability control (ESC) works normally can the automatic parking assist system be activated.

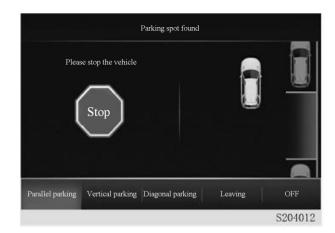
## Startup and Use

With engine started and gearshift lever in P, D or N position:

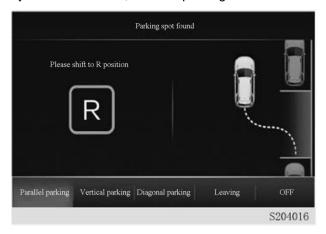
1) When the vehicle speed is less than 27 km/h, press APA switch P3 to enable the parking function. Choose parallel parking, vertical parking and diagonal parking with buttons of in Call interface. The system chooses horizontal parking on the right side by default. If it is required to park vehicle on the left side, please turn on the left turn signal lamp;



Please apply control on the steering at this moment, to ensure the vehicle passing the parking spot at a low speed, and then finish the parking process based on the instructions.



When the vehicle stops, please park the vehicle and operate the gearshift lever based on the system instructions, until the parking is done.



2) With vehicle speed less than 1 km/h, press APA switch Pa to enable horizontal leaving function. Please check the surroundings and hold the vehicle speed until the parking is done. When the vehicle speed is more than 1 km/h, leaving button fades out, and the leaving function cannot be enabled.

#### Exit

Automatic parking assist system will be inactivated in the following conditions:

- The speed exceeds 30 km/h when the driver seeks for parking spot;
- The speed exceeds 8 km/h during the process that the vehicle is parked to the parking spot;
- With APA activated, there is no operation to the system within 180 s, or the parking process takes more than 360 seconds:
- The switch of automatic parking assist system is pressed again;
- Electronic stability control (ESC) system is turned off:
- The driver interferes with the steering wheel during steering control;
- The vehicle slides during parking:
- The driver fails to operate as per the system instructions, and there is a prompt of "Wrong Track, Parking Canceled".
- In case of repeated parking, there may be a prompt of "System Interrupted, Please Take Over". If so, please cut off the power supply and wait for 30s, and then start up the system again.

#### **DANGER**

To use automatic parking assist system, please always keep the in Call interface on and operate as per the instructions.

#### **DANGER**

The driver shall apply active control on the

steering wheel when seeking for a parking spot, the parking process is done or the system exits.

- The system controls the steering wheel during the process that the vehicle is parked to the parking spot.
- It is suggested to activate APA when passing by a parking spot. If you forget to do so, you may activate it after the vehicle passing by the parking spot. APA is capable of searching for a parking spot at the backstage when the vehicle speed is less than 27 km/h.
- To search for a parking spot, the vehicle shall keep a proper distance from the obstacles making up the parking spot (0.5 m to 1.8 m would be the best). Out of this range, the system may fail to identify the parking spot.
- The best detecting performance will be achieved if the vehicle passes by the parking spot by running a straight line when it is searching for a parking spot.
- Never activate leaving function when vertical parking and diagonal parking is going on.

#### **WARNING**

- The automatic parking assist system cannot substitute the driver who is still responsible for the process and relevant operations involved. The driver shall check the surroundings, hold the vehicle speed and interferes in manually as necessary.
- The system may not be able to identify people, animals or obstacles around the vehicle. Please be extremely careful during parking.
- The system may not be able to identify objects with surface not reflecting the detecting signals, for example, people in such clothing.

- Exterior sound sources may interfere with the system, causing the system sensors fail to identify obstacles correctly. The system may also report obstacles that do not exist by mistake (occasionally).
- The system may fail to detect objects in the parking spot (such as platform trailer or big pit which is obviously above or lower than the ground level).

#### **CAUTION**

- Automatic parking assist system does not suitable for parking in the conditions involved with following obstacles: non-motor tricycle or bicycle; vehicles with lower body of no continuous physical form (such as truck, oil tank truck, trailer, etc.); obstacles without physical form (such as stop line, parking lock and stone).
- Before parking the vehicle to the parking spot, please confirm that there is no such obstacle in the parking spot like stone, thin column, rope or trailer draw bar, as the system may fail to detect these obstacles.
- The system may fail to identify certain objects (such as wire-netted fence and fluffy snow).
- Please check the availability of the parking spot found, as the system may identify the entrance, gateway and intersection as available parking spot.
- The system maps out the effective route for parking the vehicle to the parking spot based on calculation of tire circumference. Therefore, when the vehicle is installed with wheel of non-original size, tire chain or spare tire, or when the tire pressure cannot meet the standard, the system may fail to work normally, and thus the final parking position of the vehicle may be deviated.

#### **CAUTION**

- In order to guarantee normal operation of the system, it is required to keep the surface of the sensor clean and free of snow, ice and dirt.
- Do not immerse the sensors in any liquid; otherwise the sensor may be damaged.
- Rinse the sensor surface of the vehicle with small flow for a short time at a distance of at least 10 cm. It shall be avoided to clean the sensor with high pressure washer or steam washer so as not to damage the sensor.
- The system performance may be affected if the vehicle is running in severe weather conditions like rain, snow or fog, or in an environment causing vehicle vibration.

# TIRE PRESSURE MONITORING SYSTEM (TPMS) \*\*(IF EQUIPPED)

## **General Description**

When the vehicle is running, the tire pressure monitoring system monitors the pressure and temperature of the four tires. When tire pressure and tire temperature are suspicious, the system will send alarm.

The tire pressure information will be displayed on the multi-function display. With the vehicle running, press TRIP button to switch the tire information display and to check the current tire pressure.

The tire pressure indicator lamp lights up if the tire pressure goes suspicious. If the tire pressure indicator lamp lights up just because the tire pressure is excessively high/low, please calibrate the pressure according to the recommended cold-start tire pressure indicated on the vehicle nameplate, and then the lamp will go out a few minutes later.

The tire pressure indicator lamp lights up if the tire temperature is over 90°C. When the temperature goes back to 30°C, the lamp goes out automatically.

TPMS works only when all wheels are installed with proper sensors. The spare tire is not provided with a tire pressure sensor. If it is used on the vehicle and the vehicle runs for a certain time, the tire pressure fault indicator lamp will light up. Please use the genuine sensor specified by the manufacturer and conduct sensor learning.

## **Important Safety Precautions**

Please set the recommended cold-start tire pressure as the tire pressure so as to suit the corresponding driving condition. Please calibrate the tire pressure under cold status once a month. The tire is in cold status for pressure calibration under the following conditions:

- The vehicle is parked in a place without direct sunlight for at least 3 hours.
- The vehicle has run for a distance not more than 1.6 km.

During tire pressure calibration in cold status, the reading of the pressure gauge and the reading of TPMS may be different. If so, the monitoring value of TPMS shall prevail.

TPMS cannot remind the owner about fully decompression, for example, after the tire is pierced. In such cases, apply brake and park the vehicle carefully, and avoid sudden steering.

As to tire inflation, the tire pressure value will update after the vehicle has been running for a while.

#### **CAUTION**

TPMS monitors the tire pressure for the driver, and gives highly efficient warning to the owner in case of suspicious tire pressure. However, it cannot prevent all accidents.

Only the tire pressure indicated when the vehicle is running is the real-time tire pressure; when the vehicle stays still, there will be no indication of tire pressure or the indicated value is for reference only.

To replace a tire, please go to a dealer authorized

by Changan Automobile for such operation; otherwise improper operation may damage the sensor.

To exchange the position of tires, TPMS self-learning shall be performed again to avoid discrepancy of the indicated value and the actual tire position.

Under the following circumstances, TPMS may be interfered, causing the tire pressure indicator lamp lighting up by mistake.

- The vehicle runs near power cables or radio transmitter (such as close to an airport or a launching tower:
- Radio transmitter (like wireless headset and automobile data recorder) is used in or near the vehicle;
- The vehicle is installed with tire chains.

#### **CAUTION**

With snow tire installed or tire installed with chain in winter, the transmitting power of the sensor will be reduced, and the receiver may not be able to receive the signal, resulting in the tire pressure indicator lamp lighting up by mistake. To avoid wrong operation of the tire pressure system, owner may go to a dealer authorized by Changan Automobile to activate the winter mode function so as to shield invalid tire pressure alarm.

## **TPMS Alarm**

If TPMS detected tire pressure of one or more tires is low or high, there will be an alarm on the screen and the tire pressure indicator lamp will light up. At this moment, please decelerate and park the vehicle slowly and safely. Do not make a turn suddenly. Calibrate the tire pressure when the tire is cold. Please replace the tire when necessary.

If TPMS detected tire temperature of one or more tires is high, there will be an alarm on the screen and the tire pressure indicator lamp will light up. At this moment, please park the vehicle nearby safely, and start the vehicle again after the tire temperature drops. Replace the tire if necessary.

#### **CAUTION**

If the tire pressure is calibrated in a warm condition, the tire pressure indicator lamp may light up when the vehicle enters a cold environment. This is because the tire pressure has changed as the ambient temperature changes. It is not a system fault. When the vehicle is running from one place to another, if the temperatures of these two places are different, please check and calibrate the tire pressure as necessary.

In case of fault in TPMS, there will be a text warning on the screen and the tire pressure indicator lamp will light up. Please go to a dealer authorized by Changan Automobile for maintenance as soon as possible.

# CRUISE CONTROL SYSTEM **\*\*(IF EQUIPPED)**

## **Precautions**

It is possible to set the desired speed (40 km/h~180 km/h) with cruise control system. The vehicle will be running at this speed constantly.

For vehicles equipped with manual transmission, the cruise control system cannot work if the transmission is in 2nd speed or below.

For vehicles equipped with double clutch transmissions, when the shift lever is in P, N or R gear, the cruise control system will not work.

Under cruise control mode, if the vehicle is running downhill, the vehicle speed may surpass the target cruise speed; at this moment, please press the brake pedal to control the speed for DANGER prevention.

It may be dangerous to use cruise control where the vehicle cannot run at a constant speed, for example, when the vehicle is running on a winding road or in case of a traffic jam.

Please do not use cruise control when the vehicle is running on a wet and slippery road, because the wheels may idle on such road, causing vehicle out of control.

## **Buttons on Steering Wheel**

CRUISE: Press this button to turn on/off the cruise control system and the cruise control indicator lamp

on the instrument will light up or go out accordingly.

CANCEL: Press this button to exit the cruise control system. The current target cruise speed will be saved for the purpose of restoring cruise control the next time.

RES/+: Press this button to restore to the target cruise speed saved by the system or to increase the set cruise speed.

SET/-: Press this button to set the current speed as the target cruise speed or to decrease the set cruise speed.

## **Application of Cruise Function**

When the cruise control system is turned on, the cruise function can be used as per instructions given below:

## 1. Set Cruise Speed

When the vehicle is running at a desired speed, press SET/- to save the current speed as the target cruise speed. The vehicle will start cruising, and the current speed will be shown on the display screen.

## 2. Increase Cruise Speed

When the actual speed is close to the target cruise speed, it is possible to increase the cruise speed. Press RES/+ button once, and the target cruise speed will increase 5 km/h; press RES/+ button for a long time, and the speed will increase continuously. Release RES/+ button to set the current actual speed as the target cruise speed.

## 3. Decrease Cruise Speed

When the actual speed is close to the target cruise speed, it is possible to decrease the cruise speed. Press SET/- button once, and the cruise speed will decrease 5 km/h; press SET/- button for a long time, and the speed will decrease continuously. Release SET/- button to set the current actual speed as the target cruise speed.

## 4. Release Cruise Control Temporarily

In the process of cruise, if the following operations are performed or the following conditions are satisfied, the cruise control system will be inactivated temporarily, but the target cruise speed will be saved.

- Press the brake pedal;
- Press the clutch pedal (MT vehicles);
- Press CANCEL button;
- ESC system is activated;
- The actual speed is below the target cruise speed for more than 15 km/h;
- The actual speed is reduced to be lower than 40 km/h;
- The gearshift lever (of AT vehicle) is in N position or Position 1.

## 5. Restoring Cruise Control

After cruise control is released temporarily, press RES/+ button to restore cruise control if the following conditions are met:

- The vehicle speed is higher than 40 km/h;
- The gearshift lever (of AT vehicle) is in Position 2 or above;

• The gearshift lever (of MT vehicle) is in Position 3 or above:

## 6. Temporary Accelerating and Overtaking

In the process of cruise, if the driver presses the accelerator pedal to overtake, the vehicle speed will return to the previous set cruise speed after the pedal is released.

## 7. Clear Target Cruise Speed Memory

After the cruise control system or the engine is shut down, the target cruise speed saved in the system will be cleared.



#### **DANGER**

If not used, be sure to close the cruise control system to avoid any accident due to misuse.

# ADAPTIVE CRUISE CONTROL (ACC) SYSTEM (IF EQUIPPED)

Adaptive cruise control (ACC) detects the vehicle ahead with MMW radar mounted behind the lower grill of front bumper, so as to keep the vehicle running at a set speed. When there is a vehicle running in front at a speed lower than the set one, ACC will have the vehicle keep a certain distance from the vehicle ahead, and make sure the vehicle moves/stops along with the vehicle ahead.

## A

#### **WARNING**

Due to the perplexing driving conditions of real-time traffic, road and weather, it cannot be guaranteed that the radar can detect object correctly in all conditions. In bad conditions, driver must turn off ACC and drive with cautions. In an environment where the radar signals are massively reflected (like in a multi-layer parking lot and in a tunnel), the performance of radar may be degraded largely. If so, please cancel or turn off ACC. ACC cannot replace the driver. Please always be prepared to apply control over the vehicle and drive with cautions, as well as abide by traffic rules and be responsible for driving.



#### **WARNING**

ACC is applicable to driving on expressways and well-conditioned highways, not to driving on urban roads or mountain roads. Do not use ACC when drive on ramps or in tunnels.

ACC only works against vehicles in the same lane and running in the same direction. It does not work

against vehicle coming from the opposite direction/going across from the side/staying still or moving slowly. It does not work against pedestrian, animal or other objects in the road either.

Do not use ACC when the vehicle is running in extreme weather (like heavy frog, rain, snow, hail, etc.), or on wet and slippery road, or on steep hills, or in sharp turns.

#### **CAUTION**

With ACC activated, there may be sound of brake, which is normal.

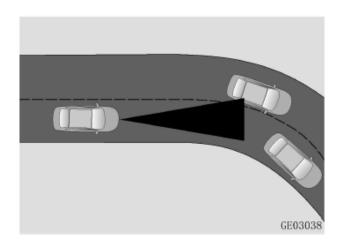
Traction and towing may degrade the dynamic performance of ACC.

Structural refitting of vehicle (like lowering the chassis or changing the front license plate mounting board) may degrade the performance of ACC, and even result in ACC failure.

It may be impossible or may take longer for the radar to detect a target vehicle in the following conditions:

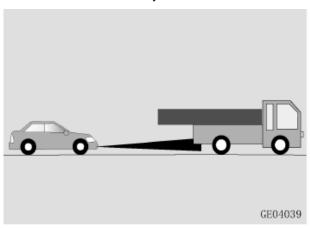
## 1. The vehicle is running in a curve road.

It may be impossible for the radar to detect the vehicle ahead in the same lane or in the adjacent lane when the vehicle is running in a curve road.



# 2. The vehicle is with special loads/equipment.

If there are special objects or accessories on the vehicle ahead, which are beyond the side, rear end and roof of the vehicle and cannot be detected by radar, or if the vehicle is overtaking a vehicle in such conditions, the driver shall keep alert and always be ready to take emergency measures and turn off ACC as necessary.

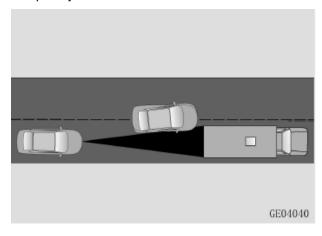


## 3. There is a vehicle with small width in front.

The radar may fail to detect vehicles with small width, like a motorcycle or a bicycle.

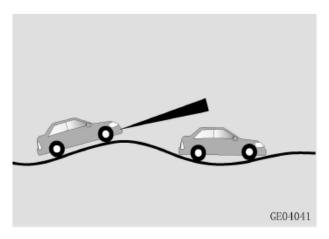
## 4. Another vehicle is changing the lane.

If a vehicle running in the adjacent lane enters the lane of the vehicle, the radar may fail to detect the former vehicle if it does not enter the detecting area completely.



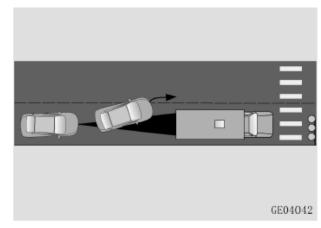
## 5. The vehicle is running on a ramp.

When the vehicle is running on a ramp, the radar may fail to detect the vehicle ahead.



## 6. The target changes.

The vehicle ahead departs from the track in a sudden, and the radar cannot identify the vehicle staying still in front.



## **Buttons on Steering Wheel**



Turn on/off the system.

Cancel ACC.

RES+: Reset ACC or increase cruise speed.

SET-: Set ACC or decrease cruise speed.

Adjust time interval (the time interval when the vehicle is following the vehicle ahead at a stable pace).

#### **CAUTION**

According to the different models you purchase, the button layout is different.

## **Cruise Display Interface**



① IACC status indicator

White: meet the activation conditions

Blue: system active
Orange: system fault

②ACC cruise status indicator

White: system standby Green: system activation Orange: system fault

3 Lane line status

Gray: unrecognized White: recognition

Red: Departure Warning

Orange: in auxiliary rectification work

Blue: IACC at work

4 This car

Set time interval and distance interval

- 6 Front car
- 7Set cruise speed
- ®Distance from the car in front
- 9Vehicles in adjacent lanes

#### **Application of Cruise Function**

Press the button , and the cruise state indicator lamp will turn white, and the system will enter standby mode.

The cruise function can be used as per instructions given below:

#### 1. Activate ACC

With ACC turned on, Press "SET-" button or "RES+" button, and the cruise state indicator lamp will turn green, indicating that ACC function is activated.



If the vehicle speed is less than 30 km/h at this moment, the cruise speed will be 30 km/h; if the vehicle speed is more than or equal to 30 km/h, the cruise speed will be the current speed.

#### **CAUTION**

In the process of instrument interface switching, the status of ACC system and relevant prompt and alarm information cannot be displayed. Please keep observing the vehicle and road conditions,

and take over the control of the vehicle in time if necessary.

ACC will not be activated in the following conditions. Instrument will give instructions correspondingly, please follow the instructions:

- The driver does not wear seat belt.
- Parking brake is not released.
- The gearshift lever is not in driving (D) position.
- ESP function is disabled.
- The vehicle speed is over 150 km/h.
- The engine hood/driver's door is not closed.
- The brake pedal is depressed when the vehicle is moving.
- HDC/ESP/ABS is activated.
- The radar is blocked/ACC is faulted, and the cruise state indicator lamp turns yellow.

## 2. Adjust Cruise Speed

With ACC activated, press "RES+" button or "SET-" to adjust the cruise speed between 30 km/h and 150 km/h.

Press the button shortly for the first time, and the cruise speed with be set to the closest value with the factor 5 km/h; after that, the cruise speed will increase/decrease for 5 km/h upon each pressing. Long press the button, and the cruise speed will keep increasing/decreasing at a rate of 1 km/h. Release the button when the desired value is achieved.



## 3. Adjust Time interval to Vehicle Ahead

With ACC activated, press [ ] to adjust the time interval in cycle. There are 4 options, with the shortest of 1.0s and the longest of 2.4s. The system is set to the longest time interval by default.

In the process of following control, there are three colors for the time interval to the vehicle ahead, namely green, yellow and red. Green indicates that the actual time interval to the vehicle ahead is basically the same with the set value. Yellow indicates that the actual time interval to the vehicle ahead is close to the set value. Red indicates that the vehicle is too close to the vehicle ahead, and please control the distance.



#### Note

You will have a short time to respond if the time interval to the vehicle ahead is set short. Please adjust the vehicle speed and the time interval to the vehicle ahead based on external factors, such as the traffic volume in front, real-time weather condition and road condition, so as to guarantee safe driving.

#### 4. Exit ACC

With ACC activated, if the following operations are performed or the following conditions are satisfied, the cruise control system will be inactivated temporarily, and the system will enter standby mode:

- Engine is shut down.
- The brake pedal is pressed.
- The vehicle stops following vehicle ahead for more than 3 minutes.
- The vehicle slides backward when it stops following the vehicle ahead.
- The button is pressed.
- The driver side door is opened/engine hood pops up.
- ESP function is disabled.
- The parking brake is applied.
- The gearshift lever is not in driving (D) position.
- The driver does not wear seat belt.
- HDC/ESP/ABS/automatic emergency brake system is activated.
- The driver has been controlling the vehicle over ACC for more than 15 minutes, or the vehicle speed is over 155 km/h.
- The target of following is lost in a short distance.
- The radar is blocked/ACC is faulted.

If the vehicle stops under the control of ACC, ACC will not be canceled when the brake pedal is depressed.

#### **CAUTION**

Any time when you believe there is a safety risk, you shall cancel or turn off ACC immediately and take over the control of vehicle.

#### 5. Restore ACC

With ACC in standby mode:

Press RES+ button, and ACC will be reactivated and restore to the speed set before:

Press SET- button, and ACC will be reactivated and set the current vehicle speed as the cruise speed. If the current speed is less than 30 km/h, the cruise speed will be set as 30 km/h.

#### **CAUTION**

If RES+ button is pressed to restore ACC, the restored set speed may be quite different from the current vehicle speed. Please set the vehicle speed cautiously and pay attention to the acceleration and deceleration.

#### 6. Override ACC

With ACC activated, depress the accelerator pedal to increase vehicle speed, and the system will enter override mode. Release the pedal, and ACC will restore automatically.



#### **CAUTION**

With ACC in override mode, the driver takes over

the control, and the distance/speed control function will not be activated.

#### 7. ACC START/STOP Control

If the target vehicle of following slows down and then stops, the vehicle will stop behind the target vehicle under the control of ACC. If the target vehicle starts within 3 seconds, the vehicle will start too under the control of ACC.

If the vehicle ahead stops for more than 3s, the vehicle will not start under the control of ACC after the target vehicle starts. If so, press "RES+" button or depress the accelerator pedal gently, and the vehicle will start under the control of ACC.



After vehicle stops under the control of ACC, the electrical hand brake will be applied automatically in the following conditions, and ACC will be canceled:

- The vehicle stops for more than 3 minutes.
- The driver side door is opened.
- The driver does not wear seat belt.
- Engine is shut down.
- Engine hood is open.
- ESC is turned off.
- The gearshift lever is in other position than forward position.

## 8. ACC Takeover Warning

The maximum brake force applied by ACC is about 40% of the vehicle's braking capacity.

If the ACC braking force is not sufficient to keep the vehicle away from the vehicle ahead for a proper distance, the instrument will give continuous warning sound and display image to remind you of depressing brake pedal. If so, please take over the vehicle control immediately and take measures to avoid collision.



#### **Troubleshooting**

When the ACC detects that the radar is covered, the radar is faulty, or the related system (such as ESC) fails, the cruise status indicator on the meter turns orange, and the corresponding prompt on the meter will be displayed.

#### 1. Radar is covered

If the instrument indicates "Forward millimeter wave radar covered", please clean the radar surface.

Please confirm that the radar surface is clean and remove surface contaminants.



## 2. Adaptive cruise system failure

After cleaning the surface of the radar, the fault can't be automatically eliminated for a long time. Please go to the CHANGAN Automobile authorized dealer for maintenance.

# In the following cases, please go to the CHANGAN Automobile Authorized Dealer to calibrate the radar:

- Disassemble or reinstall the radar or front impact beam.
- The external force causes the radar to be unstable or abnormal.
- The vehicle has been collided.
- ACC performance is degraded (if the distance to the target is abnormally shortened or the vehicle in the lane next to the vehicle is often misidentified).
- Abnormal function of automatic emergency braking system (such as frequent false alarm or braking, etc.)

#### **CAUTION**

Improper maintenance of the vehicle may result in changes in the position of the radar, which may affect the function of the ACC. Therefore, the repair work must be carried out by an authorized Changan dealer.

# INTEGRATED ADAPTIVE CRUISE CONTROL (IACC) \*\* (IF EQUIPPED)

Please read and familiarize yourself with the entire contents of this chapter before using IACC.

IACC assists the driver in controlling the vehicle to drive in the lane at a preset cruise speed or following distance.

IACC integrates the radar used by the adaptive cruise control system and the camera used in the lane departure warning system to detect the vehicle in front and the lane line. By controlling the speed, the vehicle is maintained at the set cruise speed or maintained in advance with the preceding vehicle. The vehicle follows the vehicle at a distance, and at the same time, the vehicle is driven in the lane by controlling the steering.

At any time, the driver has priority control of the vehicle.

In the following cases, the driver needs to identify the DANGER in time and cancel IACC and control the vehicle by pressing the brake pedal, pressing the cancel button, taking over steering wheel control, etc. to ensure driving safety:

- The vehicle doesn't keep a sufficient safety distance from vehicles in front and adjacent lanes;
- Assisted steering is not sufficient to safely pass the curve;
- When the vehicle is in a situation where the IACC's work is restricted.

## A

#### **WARNING**

When using IACC, the driver must hold the steering wheel with both hands and observe the road conditions in front, rear and surroundings of the vehicle at all time.

Even when using IACC, the driver always undertakes the ultimate responsibility for controlling the vehicle safely and legally, maintaining the correct distance and speed.

If IACC is not used correctly according to the requirements, it may cause traffic accidents such as collision between vehicles and surrounding objects and vehicles.

## A

#### **WARNING**

IACC is a driving assistance system, which can control the vehicle braking and steering more gently. The system can not completely avoid collision, nor can it provide the steering assistance you expect under all weather, road conditions and road types. The driver must detect and take over the control of the vehicle in time, and can not take emergency measures until the warning message is sent out by the system.

IACC is suitable for use on expressways or roads with good road conditions. Do not use IACC under the following road conditions and environmental conditions, otherwise the system may not be able to assist driving the vehicle as expected or exit directly, or even cause the risk of collision with surrounding obstacles not detected by the system:

1. Bad weather / poor visibility (such as rain / snow / fog / dust / insufficient light / reflection / backlight / glare / access tunnel / tree lined Road,

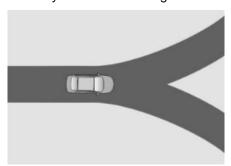
etc.).

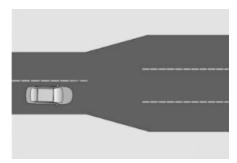
- 2. Rugged and slippery roads (such as mountain roads / roads with too small radius of curve / bumpy roads, and roads with water / snow / icing or oil pollution, sand and dust).
- 3. Roads with complex road conditions (such as congestion / intersection / cross wind section / construction section / ramp / in and out toll station, etc.).

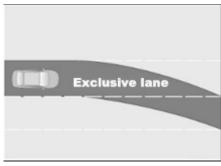
The radar and camera in IACC system may not accurately detect the lane line and vehicles in front under (but not limited to) the following conditions, so it can not help you control the vehicle to drive according to the expected track or adjust the speed and distance. Please take over the control of the vehicle in time, and turn off IACC if necessary.

#### 1. Driving route is not unique

When the number of branches or lanes changed, the system can't determine the driving direction, and may choose the wrong lane or exit directly.







#### 2. Road "closed"

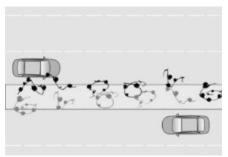
In the case of road under construction or a faulty vehicle ahead, the road passing route is a non-lane line or there is no road ahead, the system can't automatically identify and change the lane.



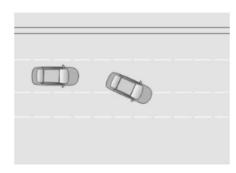


#### 3. Driveway occupied

The system can't identify the foreign objects that are intruded into the driveway and may be in DANGER of collision (such as the plants in the central barrier invade the driveway, etc.).



The system may not be able to recognize a stationary vehicle in front, especially if the speed of the vehicle is too high or there is a certain angle with the vehicle in front, there may be a risk of collision.



#### 4. Lane line is not standard

Lane lines are not clear (shabby, missing, road pavement reflection, continuous change of lightness and darkness, lane lanes are in the shade of trees or barriers, etc.), messy (such as intersections, shunts, junctions, ramps, etc., multiple sets of markings, etc.), The system can't predict the driving trajectory, unexpected steering errors may occur, or even exit directly.

#### 5. Uneven road

When the wheel presses over the pits, stones, and other protrusions on the road surface, the vehicle's heading may change momentarily due to road interference, and the vehicle may deviate from the lane. The system may temporarily exit due to a bumpy vehicle that doesn't recognize the lane line.

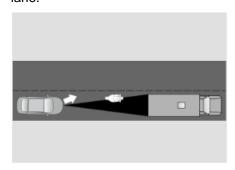
- 6. The system may misidentify lane-line-like features such as road edges (especially in tunnels), wheel marks, road gaps, snow, etc. as lanes, and vehicles will deviate from the middle of the lane or have a brief change in course.
- 7. When a vehicle enters a curve, passes through a continuous curve, or has a curve with a small turning radius, slippery roads, or speeding, the system may not be able to assist the driver to control the vehicle in the lane or even exit directly.

#### 8. Congested or confluent roads

The system may not be able to respond to vehicles approaching at close range, especially when the congested road is in the follow-up control mode, and there is a risk of collision.

In the following-up control mode, when the guide vehicle changes lanes, the host vehicle will follow the target vehicle, and there may be a risk of collision with oncoming vehicles.

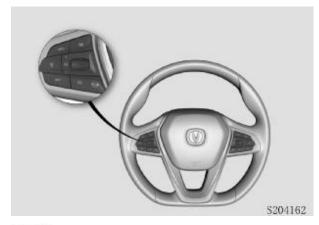
In the follow-up control mode, the control may be based on the target vehicle near the edge of the lane, the vehicle may turn to the side of the lane, and there is a risk of collision with vehicles on the lane.



- 9. The strong magnetic environment will interfere with the response of the electric power steering system (EPS). Don't place objects with strong magnetic characteristics near the EPS. When the vehicle is in a strong magnetic environment for a long time (such as a place with high-voltage electromagnetic radiation in a power plant), please pay attention to the EPS steering assist performance. If there is an abnormality, don't use IACC and immediately go to an authorized dealer of Changan for maintenance.
- 10. Don't use IACC when towing other vehicles.

Don't use IACC in any scene that affects the function and performance of the adaptive cruise system radar and lane departure warning system camera.

#### Steering wheel buttons



Activate IACC

: Activate ACC or switch to ACC from IACC

: Cancel ACC

: Adjust the time between the front vehicle (the relative time interval between the stable vehicle and the front vehicle)

RES+: Restore ACC or increase cruising speed

SETT: set ACC or reduce cruising speed

**IACC** interface



1. IACC status indicator

White: The system is in standby or temporary exit

state;

Green: system activated

Orange: system failure

2. ACC cruise status indicator

White: system standby Green: system activated

Orange: system failure

3. Lane line status

Gray: unrecognized

White: identification

Red: departure warning

Orange: auxiliary correction work in progress

Blue: IACC in operation

4. This vehicle

5. Set follow time and distance

6. Front vehicle

7. Set cruise speed

- Distance from the front vehicle
- 9. Adjacent lane vehicles

#### **CAUTION**

When IACC is working and in the following control mode, the vehicle in front is displayed in blue.

#### **WARNING**

When the adaptive cruise system is activated, the distance from the vehicle in front can be displayed. The distance displayed by the instrument and the vehicles in the adjacent lanes may be different from the actual situation. You must keep the real-time observation of the vehicles and the real road, and take full responsibility for the safe driving.

The system only controls the detected vehicles and identified lane lines, and sends out relevant warning information. Under some limited conditions, the warning message may not be sent or delayed. When the sun is strong or the driver is wearing sunglasses, it may be difficult to see the information on the instrument; when opening the window, driving at high speed or the sound of the car entertainment system is too loud, it may be difficult to hear the prompt sound from the instrument. Drivers should always pay attention to the driving state and road condition information of the vehicle, take over the control of the vehicle in time, and do not wait for the warning information to be sent out before taking counter measures.

#### IACC function use

IACC operating speed range is 0-130km / h.

1. Single lane intelligent assisted driving

IACC prioritizes steering assist control based on the clear lane lines on both sides of the recognized lane. At this time, IACC is in lane line control mode, and the IAC icon and lane lines on the instrument are displayed in green, and the front vehicle is displayed in white in longitudinal control and blue in transverse control.



#### 2. Traffic jam assistance

When the vehicle speed is lower than 60km/ h, if the lane line is not recognized, you can follow the recognized preceding vehicle. At this time, IACC is in the following control mode, and the IAC icon and the front vehicle on the meter are displayed in blue.



# **WARNING**

Traffic congestion assistance is only applicable when vehicles are queued in sequence. Don't use IACC on roads entering and exiting toll stations, chaotic traffic, random jams, and small turning radius.

When the target vehicle ahead turns too fast, the IACC can't assist the vehicle to follow the target vehicle. The system may lock the new target

vehicle or exit to the ACC active state and accelerate at the set cruise speed. The driver must always pay attention to the system status, if necessary, shut down the IACC and take control of the vehicle.

#### **Enable IACC**

Conditions for enabling IACC:

- The vehicle is powered on or the engine is started
- The shift is in P position

After the vehicle meets the conditions for enabling IACC, IACC function can be enabled on the "vehicle settings"  $\rightarrow$  "driving assistance" interface of the main page system of the multimedia display.



#### **Activate IACC**

After IACC is enabled, when the IACC activation conditions are met, the IACC icon on the instrument is displayed in white. At this time, press

IACC activation button to activate IACC, and the system will assist the driver in acceleration, deceleration, and steering control.

After IACC is activated, the IACC status indicator of the instrument will be green, and the driver can refer to the adaptive cruise control (ACC) to set the cruise speed, follow-up time, etc.



The following conditions can't activate IACC:

- 1. IACC activation conditions are not met:
- The lane lines on both sides are not recognized at the same time
- The lane line is recognized, but the lane width exceeds the road design specification range
- The lane line is recognized, but the confidence of the lane line is not high, such as blurred or incomplete lane line
- The steering force exerted by the driver is too large
- The vehicle is turning at high speed and the lateral speed is too high
- The radius of the road curve is too small
- Electronic steering (EPS) currently does not support IACC
- Wiper speed is the highest gear
- 2. Not meet the ACC activation conditions (just follow the instructions of the instrument)
- 3. The vehicle speed is higher than 130km/h
- 4. IACC is in a temporary exit state
- 5. IACC function is prohibited to use.
- 6. IACC is not enabled

# **CAUTION**

Each time IACC is activated, the cruising speed will be reset to the current speed, the minimum is 20km/h, and the maximum is 130km/h.

After IACC is activated, ACC is also activated synchronously, and the acceleration and deceleration control logic of the vehicle is the

same as when ACC is activated.

When ACC enters the driver's active acceleration mode, the acceleration and braking of the vehicle will be controlled by the driver, but IACC will still provide assisted steering.

When the IACC is working, if the driver quickly steps on the accelerator pedal, the vehicle speed will increase instantly, which may affect the stability of the IACC assisted steering. The driver must always pay attention to the driving state of the vehicle and take over the control of the vehicle in time.

# Adjust cruise speed

After activating IACC, you can refer to the ACC usage method to set the cruise speed.

# Adjust the following time and distance from the front vehicle

After activating IACC, you can adjust the following time / distance interval by following the instructions of ACC.

#### **Exit IACC**

1. Exit IACC actively

IACC can't adapt to all weather and road conditions. The driver needs to disable IACC when necessary to ensure driving safety. Active exit method of IACC:

- Press the cancel button
- Depress the brake pedal
- Press the button to reactive the IACC
- 2. Exit IACC automatically

IACC needs to work in conjunction with other

systems. When other systems don't meet the working conditions, IACC will automatically exit. IACC automatically exits as follows:

- The camera is covered.
- Other systems are failed or unavailable
- Lane assist system failure
- Driver leaves steering wheel with both hands
- Vehicle speed exceeds maximum speed limit
- Other conditions that cause ACC to exit.

To exit IACC automatically, press the key again to activate IACC.

# A

# **WARNING**

When the IACC system fails due to a failure, the vehicle needs to be restarted after the fault disappears (the flameout time is about 20s) before the IACC can be used again.

# 3. Temporary exit IACC

Due to the restrictions on the use of the IACC, the IAC will temporarily exit from the following situations:

- Missing one- or two-lane line targets
- Target vehicle is missing
- The driver turns on the turn signal
- The driver actively turns the steering wheel
- Lane width exceeds the scope of road code design standards
- The corner radius is too small

#### Vehicle instability

When IACC exits temporarily, only steering assistance exits, and the system will continue to assist the driver in accelerating and decelerating the vehicle.

After the temporary exit exceeds the time limit, the system will exit completely. It is necessary to press the IACC activation button again to activate IACC.

#### CAUTION

The driver should always pay attention to the system status, promptly notice that the IACC has exited, and take over the control of the vehicle before the IACC is reactivated.

#### IACC takeover reminder

In lane line control mode, when the IACC can't control the vehicle to drive in the middle of the lane due to excessive vehicle speed and slippery roads, the IACC will issue a takeover request when the vehicle is about to depart from the lane. In this case, take over control of the vehicle immediately.



# **Driving behavior monitoring**

IACC is an assisted driving system. When using IACC, both hands can't leave the steering wheel. If the system detects that the steering wheel is not held tight with both hands, the meter will send out alarm messages including images (blink of the meter frame), sound (ding), and text prompts.

If the driver doesn't hold the steering wheel again with both hands after the alarm, the IACC will control the vehicle to open the double flash, decelerate to a stop, and prohibit the Owner from using the IACC function again in the current ignition cycle. After the vehicle stops, the IACC exits and enters the ACC stop control mode.



#### IACC troubleshooting

When the front millimeter-wave radar, forward-looking camera or related system fails, the IACC will enter a fault state. At this time, when the IACC button is pressed to activate the IACC, an orange IACC status indicator will display on the meter.

After the IACC system is faulty, please refer to the adaptive cruise control system and the lane departure warning system for troubleshooting. If the fault can't be eliminated, please go to an authorized dealer of Changan Automobile for maintenance.

# AUTOMATIC EMERGENCY BRAKING ASSISTANCE SYSTEM (AEB) \*\*(IF EQUIPPED)

The automatic emergency braking assistance system includes a front collision warning system and an automatic emergency braking system.

The forward collision warning system alerts the driver to brake in time when there is a DANGER of rear-end collision with the target in front.

If the driver's braking force is insufficient, the automatic emergency braking system will assist the driver to brake; if the driver doesn't respond at all, the automatic emergency braking system will actively apply the brake to avoid or reduce the injury caused by the collision accident.

Please read and become familiar with the entire contents of this chapter.



#### **WARNING**

The system can only assist the driver in certain situations. At all times, the driver has the highest control over the vehicle.

The driver must be responsible for how to drive and how to avoid collision hazards. The system will not work when the driver actively avoids DANGER and will not interfere with the operation of the driver.

The system can work on vehicles traveling in the same direction in front of the lane, but it has no effect on oncoming vehicles, animals, vehicles passing laterally and other objects on the road. Fusion camera models can work for pedestrians.

stationary vehicles, and cyclists (motorcycles, bicycles) in front of the lane.

Due to the inherent limitations of the system, false triggering can't be completely avoided.

The automatic emergency braking assistance system and the adaptive cruise system share the front millimeter-wave radar to detect the front vehicle. On models equipped with integrated adaptive cruise function, the automatic emergency braking assistance system will integrate the front millimeter-wave radar and the forward-looking camera. To identify the target in front, but the detection limitations of the radar will also affect the system performance.



#### **WARNING**

Due to the complex driving environment of realtime traffic, roads, and weather, radar can't ensure correct detection under various conditions. If the radar can't detect the vehicle in front, the system will not work.

- 1.Bad weather (such as heavy rain / snow / hail, etc.) and slippery roads will cause system performance to decrease.
- 2. For the cut in target, the target detected only after the vehicle lane change, the target in the sharp turning road and the target short-range emergency braking, etc.
- 3. The radar is affected by the environment (such as electric field interference, underground parking lots, tunnels, iron bridges, rails, construction areas, wide and high gates, etc.).
- 4. The calibration of the radar will be affected when subjected to strong vibration or slight impact, which will reduce the performance of the system or increase the false trigger rate. Please check the radar installation location or calibrate the radar.
- 5.The camera may not operate in cold, harsh

weather conditions. Rain, snow, fog, and low light can affect the pedestrian's recognition of the camera and reduce the performance of the pedestrian early warning auxiliary braking system.

6. The camera is shifted by bird droppings, dirt, ice, insects, etc., and the system may not work. Windshield repairs near the camera (inside rearview mirror position) are strictly prohibited.

7.Structurally modified vehicles (such as lowering the chassis height, changing the vehicle's front license plate mounting plate, etc.) may reduce system performance or increase the false trigger rate, and even make the system unusable.

#### System operation

The function can be turned on and off in the interface of "Settings" - "vehicle" and " Forward collision warning system" of In call system".



# WARNING

The system must be shut down when:

- When the vehicle is towed
- When the vehicle is on a drum test stand
- When an external force (such as a rear-end collision) acts on the radar

# Forward collision warning system

The front collision warning system can alert you to brake in time when there is a risk of rear end collision with the car in front.

When the distance is too close to the vehicle for a long time, the meter will prompt "Please keep a safe distance". This alarm only works on moving vehicles at the speed of the vehicle (70-150km / h).



When the vehicle is driving at medium and high speeds, if there is a DANGER of collision with the target in front, the instrument will prompt "Collision DANGER" and continuous sound alarm. The alarm works for stationary vehicles (the speed of this vehicle is 30-85km / h) and moving vehicles (the speed of this vehicle is 30-150km / h).



# In the following conditions, the system won't work:

- Front collision warning system is off
- Shift is not in D position.
- Vehicle speed is outside the working speed range.
- Driver is braking or active steering
- The driver stepped on the accelerator pedal sharply
- Engine is off
- The system believes that the DANGER of collision has been released

- Vehicle is instability
- System initialization
- ESC system failure
- Instrument failure
- Automatic emergency braking system failure
- Radar is covered

The warning sensitivity of the front collision warning system is divided into three levels: early, middle and late. The higher the sensitivity, the sooner the system alerts the driver of the DANGER of collision, and the more frequent the warning.

### **Automatic emergency braking function**

If the front collision warning function alarms, the driver steps on the brake or the braking force is insufficient, the automatic emergency braking function will assist the driver to brake, and the instrument will display "automatic emergency braking". This function is applicable to stationary vehicles (the vehicle speed is 4-48km / h) and moving vehicles.

If the driver fails to respond to the collision alarm, the collision mitigation system will brake actively to slow down or avoid the collision before the collision happens. Meanwhile, the instrument will display "automatic emergency braking". This function works on stationary vehicles (the speed of the vehicle is 4-48km / h) and moving vehicles (the speed of the vehicle is 4-150km / h).



# In the following conditions, the system won't work:

- Front collision warning system is off
- The driver doesn't wear safety belt
- Shift is not in D position
- Vehicle speed is outside the working speed range
- Driver is braking or active steering
- The driver stepped on the accelerator pedal sharply
- Engine is off
- The system believes that the DANGER of collision has been released
- Vehicle is instability
- System initialization
- ESC system failure
- Instrument failure
- Automatic emergency braking system failure
- Radar is covered

#### CAUTION

The early warning auxiliary braking system is working in the background and will not be detected by the driver. If the vehicle in front is detected by

the system, it will not be displayed to the driver. If the pre-warning auxiliary braking system actively brakes to completely avoid collision, the system will release the brake after stopping for 1.5 s, and the driver must take over the control.

# PEDESTRIAN IDENTIFICATION\*(IF EQUIPPED)

When the vehicle is equipped with an integrated adaptive cruise system, the pre-warning auxiliary braking system can identify pedestrians for crossing the road. When the early-warning auxiliary braking system is aimed at pedestrians, it includes front collision early warning system and collision mitigation system. The pedestrian front collision warning system reminds the driver to brake in time by warning when there is a risk of rear end collision with pedestrians crossing the road.

If the driver does not respond at all, the collision mitigation system will actively apply the brake to avoid or reduce the injury caused by the collision accident. Pedestrian recognition is to detect pedestrians through millimeter wave radar and lane assistant early warning system used by acc. the detection limitations of camera and radar will affect the performance of pedestrian early warning auxiliary braking system.

# **WARNING**

Due to the complexity of real-time traffic, road, weather and other vehicle driving environment, radar can not ensure the correct detection in all conditions. If the radar cannot detect the pedestrian ahead, the pedestrian warning auxiliary braking system will not work.

Bad weather (such as heavy rain, heavy snow,

hail, etc.) and wet road (such as ice and snow, wet or waterlogged road section, etc.) will lead to the performance degradation of pedestrian early warning auxiliary braking system.

When the radar system is affected by the environment (such as electric field interference, underground parking lot, tunnel, railway bridge, track, construction area, width and height limit door, etc.), the detection will be interfered, and the performance of pedestrian early warning auxiliary braking system will decline or the false triggering rate will increase.

The calibration of the radar will be affected by strong vibration or slight impact, which will reduce the performance of the pedestrian early warning auxiliary braking system or increase the false triggering rate. It is necessary to check the installation position of the radar or recalibrate the radar.

Structural modification of vehicles (such as lowering the chassis height, changing the front license plate mounting plate, etc.) may reduce the performance of pedestrian early warning auxiliary braking system or increase the false triggering rate.

The camera may not operate in cold, harsh weather conditions. Rain, snow, fog and low illumination can affect the recognition of pedestrian by camera, and reduce the performance of pedestrian early warning auxiliary braking system.

The sensor is blocked by bird droppings, soil, ice, insects, etc. the system may not work. It is strictly forbidden to repair the windshield near the sensor (inside rearview mirror position).

# **System operation**

The function can be turned on and off in the

interface of "Settings" - "vehicle" and " Forward collision warning system" of In call system".

#### WARNING

The system must be shut down when:

- When the vehicle is towed
- When the vehicle is on a drum test stand
- When an external force (such as a rear-end collision) acts on the radar

#### Forward collision warning system

When the vehicle is running, if there is a risk of collision with pedestrians crossing the road, the instrument will give a continuous alarm sound, and remind the driver of "collision risk".

The working speed range of "collision DANGER" alarm for pedestrians is about 30km / h-60km / h.

### Automatic emergency braking function

If the driver fails to respond to the collision alarm, the collision mitigation system will brake actively to slow down or avoid the collision before the collision happens. Meanwhile, the instrument will display "automatic emergency braking". The working speed range of this function for pedestrians is about 4km / h-60km / h.



In the following conditions, the system won't work:

- Front collision warning system is off
- The driver doesn't wear safety belt
- Shift is not in D position
- Vehicle speed is outside the working speed range
- Driver is braking or active steering
- The driver stepped on the accelerator pedal sharply
- Engine is off
- The system believes that the DANGER of collision has been released
- Vehicle is instability
- System initialization
- ESC system failure
- Instrument failure
- Automatic emergency braking system failure
- Radar is covered

### **CAUTION**

The early warning auxiliary braking system is working in the background and will not be detected by the driver. If the vehicle in front is detected by the system, it will not be displayed to the driver.

If the pre-warning auxiliary braking system actively brakes to completely avoid collision, the system will release the brake after stopping for 1.5 s, and the driver must take over the control.

### **Troubleshooting**

When the system detects that the radar is blocked, the radar is out of order, or the related system (such as ESC) is out of order, the indicator light of adaptive cruise and early warning auxiliary braking system on the instrument will turn orange, and "radar is blocked" or "early warning auxiliary braking system is out of order" will be prompted on the instrument.

When ACC and PAB systems have faults at the same time, the indicator light of early warning auxiliary braking system on the instrument turns orange, the adaptive cruise icon turns orange, and "radar blocked" or "early warning auxiliary system fault" is prompted on the instrument.

1. Early warning of auxiliary braking system failure If the instrument prompts "early warning auxiliary braking system fault", and it cannot be automatically eliminated for a long time, and the fault still exists after restart, please go to the authorized dealer of Changan Automobile for processing.



2. In the following cases, please go to the authorized service network of Changan Automobile for professional calibration of Radar:

- Remove / refit radar or front impact beam.
- The external force causes the radar to be unstable or the position is abnormal.
- There has been a collision.
- The early warning auxiliary braking system has abnormal function (such as frequent false alarm or braking, etc.).

### **CAUTION**

Improper maintenance of the front end of the

vehicle may cause the change of radar position, which will affect the function of acc/ early warning auxiliary braking system. Therefore, the maintenance work must be carried out by the authorized dealer of Changan automobile.

# LANE DEPARTURE WARNING (LDW) SYSTEM (IF EQUIPPED)

Lane departure warning (LDW) system is an auxiliary warning system which reminds the driver of unconscious departure from the lane when the vehicle is running at a high speed. LDW detects the lane lines in front of the vehicle with sensor installed behind the windshield. When the vehicle goes across the line, there will be warning image and sound, or the steering wheel vibrates to remind the driver about the situation.

#### WARNING

LDW is only an auxiliary function which may not be suitable to all driving conditions. You shall always be prepared to apply control over the vehicle. Drive with cautions and be responsible for driving. LDW may not function right in bad weather, as rain, snow, fog or harsh illumination condition (at the time of entering and leaving a tunnel) may affect the sensor. LDW may fail to work or give false warning under the following working and road conditions:

- There are temporary mark lines for road construction.
- There is water ponding or crack in road pavement.
- The lane line is covered by dirt/snow.

- The sensor is blocked.
- The sensor fails to track the lane lines on the surface.
- The vehicle is running in a sharp curve or on a narrow road.
- It is strictly forbidden to maintain the windshield near the sensor (at the position of interior rearview mirror). Defects like crack may affect the identifying performance of the camera. The windshield can only be replaced in a whole piece.

# **Use of Lane Departure Warning System**

When the vehicle speed is more than 65 km/h and the lane line is clear to see, LDW system will be activated. If the lane width is less than 2.5 m, LDW will be disabled and enter standby mode. LDW will be enabled again if the road gets wide enough.

With vehicle power\_supply at ON position, press

LDW switch button in the instrument switch box to turn on/off the system.

With LDW system ON but not activated, the LDW indicator lamp is in white.

With LDW system ON and activated, the indicator lamp on the lower right corner of the instrument is in green.



If the sensor identifies lane lines on both sides, the lane will be set out by two white lines (if only the lane line on one side is identified, the identified line will be set out in white; if there is no lane line identified on either side, there will be no line set out).



# **Lane Departure Warning Mode**

There are three options of lane departure warning mode:

- ① Instrument image + sound warning;
- 2 Instrument image + vibration warning;
- ③ Instrument image + sound warning + vibration warning.

The instrument image refers to the lane line on the departing side turning red, the sound warning refers to the tinkle, and the vibration warning refers to the vibration of steering wheel.

When there is a warning of lane departure, please correct the heading direction of vehicle immediately.

# Sensitivity of Lane Departure Warning System

LDW sensitivity refers to the frequency at which LDW is triggered. With a high sensitivity, there will be less restriction to LDW activation; with a standard sensitivity, there will be more restriction.

Restriction of High Sensitivity

- The turn signal lamp of the turning side lights up.
- Emergency warning indicator lamp is turned on.
- ESC or ABS interferes for control.
- The vehicle goes across lane lines continuously and quickly.
- The vehicle has run out of dangerous area.

Besides the restrictions of high sensitivity, there are the following restrictions of standard sensitivity:

- The vehicle takes a sharp turn at an excessive turning speed.
- Active acceleration is applied by depressing the accelerator pedal hard.
- Force brake is applied.
- The vehicle takes a sharp turn.

If this function is fitted, the system assistance mode of the vehicle departing from the lane can be set.

# Function selection of lane departure system (if equipped)

If equipped with this function, the auxiliary mode of the system can be set when the vehicle deviates from the lane.

In the "Settings" - "vehicle" - "Lane Assist" interface of In call system, you can select the following functions: warning only, deviation correction only, warning + deviation correction.

When the driver drives the vehicle to deviate from

the lane unconsciously, if only early warning is selected, the system will issue departure warning; if only correction is selected, the system will provide auxiliary steering for a short time to assist the driver to correct the vehicle trajectory and avoid the vehicle to deviate from the lane; if early warning + correction is selected, the system will not only correct the deviation, but also issue departure warning.

When correcting the deviation, the corresponding side lane line is displayed in orange.



# WARNING

The driver should always be fully responsible for how to control the vehicle correctly and keep it safe

- 1. The system will not continuously correct the deviation. When the system issues deviation warning or auxiliary steering, the driver should immediately correct the vehicle trajectory to ensure driving safety.
- 2. When the system is limited, such as rain / snow / fog / dust weather, poor visibility, etc., the deviation alarm or auxiliary steering may not be sent out or sent out late. Do not use it under the system limited conditions.
- 3. The auxiliary correction provided by the system may not be able to prevent vehicles from deviating from the lane, such as on wet roads, sharp turns, high speed and so on.

# **Troubleshooting**

If LDW detects that the camera is covered, the system is faulted or not calibrated, or there is fault in relevant system, LDW indicator lamp on the instrument may turn yellow. At the same time, the instrument will give instruction accordingly.

# 1. Camera Being Covered

If the instrument indicates "Camera being covered", please turn on the wiper to clean the windshield and start the vehicle again. If the fault is still there, please go to a dealer authorized by Changan Automobile for maintenance.



### 2. LAS Not Calibrated

If the instrument indicates "LAS not calibrated", and the indication has not been gone after a long time, please restart the vehicle. If the fault is still there after that, please go to a dealer authorized by Changan Automobile for maintenance.



# 3. Fault in Lane Assistance System

If the instrument indicates "Fault in lane assistant system", and the indication has not been gone after a long time, please restart the vehicle. If the fault is still there after that, please go to a dealer authorized by Changan Automobile for maintenance.



THE SPEED LIMIT SIGN RECOGNITION ((TSR) \*\*(IF EQUIPPED)

Traffic Sign Recognition System (TSR) shares a camera with the lane assist system (LDW) to detect speed limit signs on / by the road and display them on the instrument to help drivers observe road speed limit signs.



Speed limit signs classified by model, TSR show the speed limit value of vehicles.

When there are maximum and minimum speed limit signs, TSR displays the maximum speed limit value.



#### WARNING

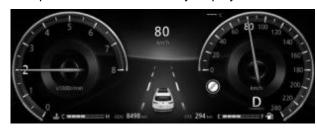
TSR is an assist function and can't be applied to all driving situations. The speed limit value

recognized by the system may be different from the speed limit value provided by the navigation system you use. You must maintain observation of the driving route, drive carefully and keep safe responsible for legal speed.

#### Use of TSR

The function can be turned on and off in the "Settings" - vehicle - "Lane Assist" interface of In call system. At the same time, you can set on / off overspeed warning, overspeed warning deviation (within ± 10km / h range), and on / off overspeed warning sound.

After the vehicle passes the speed limit sign, the meter will continuously display the speed limit information within a certain driving distance (0.2-3km). After the vehicle passes the speed limit cancel sign, the meter will display the speed limit canceled information (the specific value is not displayed). If the canceled sign and the speed limit value of the next section appear at the same time, the speed limit value is directly displayed.



#### TSR detection limit

TSR detection performance is affected by restrictions such as weather, illumination, and location of road signs. TSR detection will be limited in the following cases:

Slanted / damaged sign

- The sign on the curve is completely / partially obscured
- Improperly placed signs
- Signs covered in snow or thick dust
- Signs beyond camera field of view
- Poor environment such as rain / snow / fog
- Insufficient lighting at night
- Vehicle driving against light

#### **Troubleshooting**

If the meter prompts "Speed limit sign system failure" and can't be eliminated automatically for a long time, the fault still exists after restarting the vehicle, please go to the authorized dealer of Changan Automobile for maintenance.

# **CAUTION**

Improper repair of the windshield may cause the position of the camera to change, which will affect the function of the TSR. Therefore, maintenance work must be performed by Changan Automobile authorized dealers.

# FAR/LOW BEAM) SYSTEM (FAB\*(IF EQUIPPED)

The automatic high beam system (FAB) and LDW system share the same camera to detect the taillights of the vehicle in front, the headlights and street lights of the oncoming vehicle, and automatically turn on and off the high beam. When the driving road environment is dark and there is no vehicle or street lamp ahead, this function will automatically start the high beam; otherwise, it will release the high beam.

# **WARNING**

- FAB is just an auxiliary function for driver, which turns on and off the high beam lamp under proper conditions. If FAB fails to turn on or off the high beam lamp, you may do it manually.
- If the vehicle is running in heavy rain, fog, snow or mud, please always control the lamps manually.
- Always apply control manually when there is pedestrian or bicycle on or beside the road.
- When the vehicle is taking a sharp turn, always apply control manually.
- If the light from the coming vehicle is shifted (by barriers like isolation strip), the system may not turn off the high beam lamp.

#### FAB ON/OFF

FAB can be activated or inactivated via multimedia system, under "Setting" → "Vehicle" → "Light"

interfaces. The icon will be displayed on the upper right corner; turn the light switch to AUTO position, FAB will enter standby mode.

#### **High Beam ON/OFF**

When the vehicle is running at a speed over 30 km/h in night, FAB will be activated.

If the camera detects no vehicle or road lamp in front, FAB will turn on the high beam lamp, and the high beam lamp icon on the instrument will light up. If the camera detects vehicle or road lamp in front, or the ambient illumination goes brighter, FAB will turn off high beam lamp automatically, and the high beam lamp icon on instrument will go out.

When the camera detects that the vehicle ahead is gone, FAB will turn on high beam lamps again.

The driver can still turn on and off high beam lamps and low beam lamps manually even when FAB is working.

# **Troubleshooting**

In case of fault in FAB system or other relevant systems, the instrument will indicate "Fault of FAB system". If the indication has not been gone within a long time, please switch off the power supply and then switch it on. If the fault is still there after that, please go to a dealer authorized by Changan Automobile for maintenance

# REAR WARNING ASSISTANT SYSTEM \*\*(IF EQUIPPED)

Rear warning assistant system consists of lane change decision aid (LCDA), cross traffic alert (CTA) and rear-end collision warning (RCW). It detects the moving target of potential rear-end collision risk behind the vehicle with MMW radars mounted in the left and right sides of the rear bumper, and helps the driver to avoid accident during driving with the warning indicator lamps (on

the exterior rearview mirrors) and the instrument.

#### **CAUTION**

Rear warning assistant system is only an auxiliary function for driving. You shall always be prepared to apply control over the vehicle. Drive with cautions and be responsible for driving.

Please always keep the sensor and the surrounding areas clean. After the vehicle running in mud for a long time, please remove the rear bumper for thorough cleaning;

Do not refit or add accessories, or attach labels on the sensor or the surrounding areas;

Do not remove or interchange the sensor without permission;

Any slight movement of sensor may result in system failure. If the sensor or the surrounding area is impacted, please go to a dealer authorized by Changan Automobile for maintenance.

# **System Self-inspection**

With power switch at ON position, the system starts self-inspection. The warning indicator lamp on the exterior rearview mirror will light up and then go out about 3s later. If the indicator lamp keeps being on, it indicates fault of system. If so, please go to a dealer authorized by Changan Automobile for inspection.

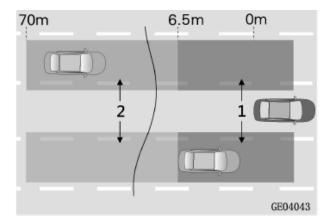
#### Turn On/Off

This function can be activated and inactivated via in Call system, under "Setting"  $\rightarrow$  "Vehicle"  $\rightarrow$  "Rear Warning" interface.

# **Lane Change Decision Aid**

Lane change decision aid (LCDA) consists of dead zone detecting and lane change assist, which cover the areas on both sides and behind the vehicle. When the vehicle makes a turn or changes to another lane, LCDA can improve the monitoring over the dead zone. With the lane change assist ON and vehicle speed over 15 km/h, the warning indicator lamp on the side of the target vehicle will light up in the following conditions:

- 1) The vehicle overtakes the target vehicle in Zone 1, and the relative speed is less than 15 km/h;
- 2) The target vehicle overtakes the vehicle from Zone 1:
- 3) The target vehicle approaches from the third lane or from the lane the vehicle is in, and enters Zone 1. and then overtakes the vehicle:
- 4) The target vehicle approaches quickly from Zone 2, and the maximum warning distance is about 70 m:
- 5) The target vehicle approaches from the third lane or from the lane the vehicle is in, and enters Zone 2 quickly.



- 1-Non-detection zone
- 2-Lane-change-assist zone

If the turn signal lamp on the side of the target vehicle lights up, the warning indicator lamp will flash instead of keeping being on.

The brightness of the warning indicator lamp is adjusted automatically based on the environment. When the headlamp is on during the night, the indicator lamp goes dark; when the headlamp is off during the daytime, the indicator lamp goes bright.

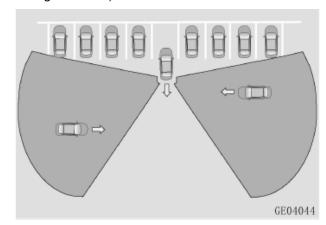
# **CAUTION**

Based on the characteristic of radar, when the vehicle gets closer to the crash barrier or similar fixed boundary of the lane, the system may give false warning; when the vehicle is running parallel to a long vehicle (like a truck) for a long time, the warning may stop.

# **Cross Traffic Alert**

With cross traffic alert (CTA) activated and gearshift lever in reverse gear, if a target vehicle is approaching the vehicle from the side, and the

running direction of the target vehicle crosses with the running direction of the vehicle, the warning will be enabled. If so, the warning indicator lamp on the side of target vehicle will flash, accompanied with warning tone. The maximum warning distance is about 30 mm (the detecting zone is the gray area in the figure below).



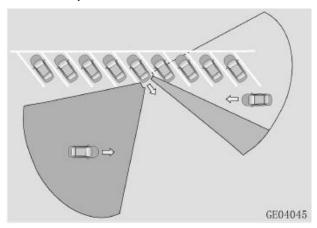
# **CAUTION**

CTA is designed to detect moving vehicle. It may identify small targets like bicycle, pedestrian and baby carriage only under favorable conditions. Please check the surroundings and ensure safety during reversing.

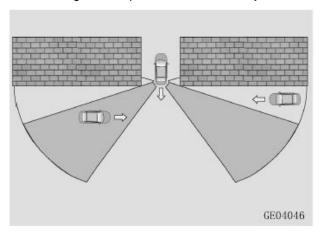
# **Restrictions to Function**

CTA may not always work effectively for all parking spots. For example, in the condition stated below, the radar is blocked by the objects around the vehicle, and the detection zone becomes smaller therefor. As a result, the system can only be activated when other vehicles on the side are extremely close to the vehicle.

• Detection zone becomes smaller due to barrier of adjacent vehicle



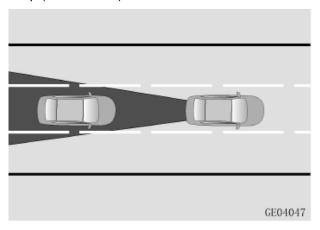
• The detection area becomes smaller due to the blocking of wall, parterre and other objects



# **Rear-end Collision Warning**

Rear-end collision warning (RCW) works when the relative speed is less than or equal to 70 km/h. If the relative speed is more than 70 km/h, the

maximum rear view distance will be limited to 70 m. With RCW activated and gearshift lever in D position, when the target vehicle approaches quickly and the system identifies the risk of collision, the instrument will give warning and the warning lamp (double-flash) flashes.



Based on the urgent level of collision, the RCW warnings can be divided into basic warning and intensive warning.

Basic warning



Intensive warning



# **CAUTION**

RCW may not be able to identify the following targets/objects:

- Moving bicycle, pedestrian, small motorcycle, baby carriage and other small targets
- Parterre, isolation fence, roadside plant, parking vehicle and other static targets
- Vehicle running in opposite direction

# **System Fault**

System fault will be caused in the following conditions. The instrument will indicate "Failure of left/right lane change decision aid system" or "Left/right LCDA radar being blocked".

- Fault of radar sensor
- Radar sensor covered by mud, ice, snow, or refitting accessories
- Fault of another related controller



If it indicates radar being covered, please remove the accessories on the radar sensor, or try to rinse the external surface of the rear bumpers at the radar sensor position. If such indication keeps being displayed for a long time, please go to a dealer authorized by Changan Automobile for maintenance.

# **Detection Limit and False Warning**

The system may fail to work normally under the following conditions.

1) It may fail to detect targets as usual if:

- The vehicle is running on a road covered by mud, sand or snow.
- The vehicle is running in bad weather like rain, fog or heavy snow.
- The vehicle is running uphill or downhill.
- The vehicle takes a sharp turn, or accelerates and decelerates rapidly.
- There is a noticeable height difference between the target vehicle and the vehicle.
- The lane is wide and the vehicle is far away from the adjacent vehicle in the same lane.

- Another vehicle is towed by the vehicle.
- 2) It may give more false warnings in the following conditions:
- The rear bumper is covered up by mud, ice or snow.
- The vehicle is running close to isolation strip, parterre and other roadside structure.
- There is an object, like a bicycle, attached to the rear end of the vehicle.
- There are a plenty of metals in the surrounding, such as plant or container dock.

# EXHAUST EMISSION CONTROL SYSTEM

When the engine stalls or fails to start, the exhaust emission control system may be damaged if you try to start the engine repeatedly and continuously.

It is prohibited to refit the exhaust emission control system as this will affect the vehicle performance or even violate relevant laws or regulations. Any vehicle damage or performance fault due to such refitting is not within the scope of warranty.

# Preventions Against Engine Exhaust Emission

When you smelled the odor of any exhaust gas in your vehicle, please check the vehicle immediately. If you doubt that the discharged exhaust gas has entered the vehicle when you are driving, please open all the windows and check the vehicle immediately.

Please do not start the engine in an unventilated or

enclosed area (e.g., a garage) unless it is necessary to move the vehicle in or out.

When it is necessary to park the vehicle in an open field for a long time with the engine running, please adjust the ventilation system to allow the air outside to enter the vehicle. Do not sit in the vehicle for a long time under such condition.

#### **DANGER**

The exhaust gas discharged by the engine contains carbon monoxide (CO) and a small amount of benzene homologs and derivates. Excessive inhaling of CO is fatal and inhaling of benzene homologs and derivates for a long time will also do harm to your health.

### Gasoline Particle Trap (GPF) %(if equipped)

Gasoline particulate trap is a device used to capture soot particles in automobile exhaust to purify exhaust emissions to meet national emission regulations.

# **Gasoline Particle Trap (GPF) Maintenance**

When the meter displays the words of GPF maintenance, the Owner can choose the following two methods to deal with according to the actual situation:

- Please go to the nearest authorized dealer of Changan Automobile for maintenance as soon as possible (recommended).
- Under the condition of ensuring safe driving, the driver should handle according to special working conditions.

When the GPF maintenance word on the meter disappears, the vehicle can drive normally.

# Precautions Related to Catalytic Converter

- Do not drive the vehicle with an engine fault like flameout or noticeable performance degradation.
- Do not use the engine incorrectly or improperly, for example, coast with the ignition switch at OFF position or drive down along an abrupt slope with a gear engaged.
- Do not allow the engine to run at a high idling speed for a long time (not less than five minutes).
- It is prohibited to refit any component of the engine or the exhaust emission control system. All the checks and adjustments shall be conducted by a dealer authorized by Changan Automobile.
- Do not drive the vehicle when the fuel level is low. If the fuel is used up, the engine will pause and the catalytic converter will be damaged.

Failure to conform to the foregoing preventive measures will cause damage to the catalytic converter, which is not within the scope of warranty.

# A

# **WARNING**

Do not park the vehicle or allow it to idle near flammables such as grasses, papers or leaves. The heat generated by the engine and the exhaust system is likely to cause a fire.

It is prohibited to touch components of the exhaust system (e.g. the tail pipe) without wearing any protective device before the exhaust system stops operating and cools down; otherwise you may be scalded.

# **OTHER DEVICES**

# **Storage Space**



#### **WARNING**

If you fail to place objects properly in the vehicle, they may slide or be thrown off during braking or sudden turning and hit the driver or the passenger, resulting in personal injury;

- Please close the lockable storage box when the vehicle is running.
- Please fix the objects firmly and ensure that no movable objects exist in the vehicle.
- Please do ensure that no objects will pop out of the storage box or the parcel net.
- Please do place objects which are heavy, hard, pointed, sharp, or fragile in the trunk and fasten them reliably.

# **Glove Box**



Open: Pull the handle, and the glove box cover will fall slowly until the box is fully open. The pen clip and card slot in the glove box can hold the sign pen

and cards like a bank card.

Close: Pull up the cover and engage it properly.

# A

#### **WARNING**

- When the vehicle is running, please close the glove box immediately right after finish using; otherwise, personal injuries may be caused in accidents.
- Do not put valuables in the glove box.
- After open the glove box, do not drag the box cover to open forcibly; otherwise the damper may be damaged.

#### **Bill Box**



Open: Pull the groove, and the bill box drops to fully open.

Close: Pull up the cover and engage it properly.



# **WARNING**

 When the vehicle is running, please close the bill box immediately right after finish using; otherwise, personal injuries may be caused in accidents. • Do not put valuables in the bill box.

# **Top Storage Box**



Open: Press down the button of cover plate, and the plate will pop up.

Close: Pull up the cover and engage it properly.



#### **DANGER**

To reduce the risk of injury, please close the top storage box when the vehicle is running.

#### **Front Armrest**



# **DANGER**

To reduce the risk of injury, please close the armrest box when the vehicle is running.

#### Front armrest



Pull up the handle to open the armrest box.

# **Rear Armrest**

See Chapter "III. Vehicle Safety System - Seats - Adjustment of Rear Seats".

# **Cup Holder**

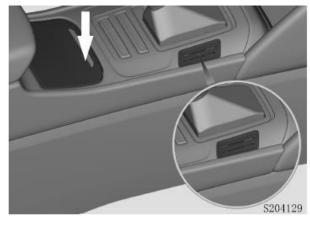


# **DANGER**

Please always use light and breakage-proof container and make sure the beverage in the container is not hot; otherwise it may increase the risk of injury in accidents.

Please always place containers with proper size and lid in the cup holder; otherwise the beverage in the container may splash out.

# Front cup holder



Open: Press down the button of cover plate and then release it, and the plate will pop up.

Close: Pull up the cover and engage it properly.

You may put some card with the size of a bank card into the double-card slot beside the cup holder.

Rear cup holder

Turn over the rear middle armrest, and the rear cup holder will be accessible.



# Seat Backrest Pocket \*\*(if equipped)

There are pockets on the backrests of the front seats.



# **DANGER**

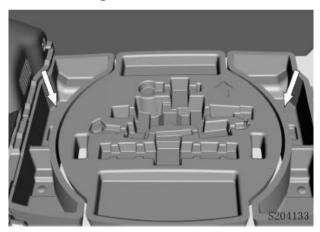
Do not place anything heavy or sharp in the backrest pocket.

# **Storage Box on Trunk Side**



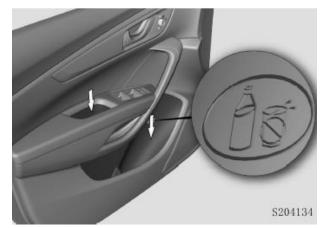
When the trunk is open, you may put small things into this storage box.

# **Trunk Storage Box**



When the trunk carpet is removed, you may put small things into this storage box.

# Storage Box on Inner Side of Door



You may put the water cup, beverage can, etc. into the lower bigger storage box, and put the smaller things in the upper storage box.

# **DANGER**

Do not put anything fragile in the storage box on the inner side of the door, as it may increase risk of injury in accidents.

# **Glasses Box**

The glasses box is used to keep glasses. The switch of the box is at the sunroof switch. Press the switch to use the box, and push the box upwards to close it.

# **Cigarette Lighter and Socket**



Before using the cigarette lighter, make sure to install the cigarette lighter completely into the base, then press the cigarette lighter button and the cigarette lighter will pop out a little. You may pull it out and use it.

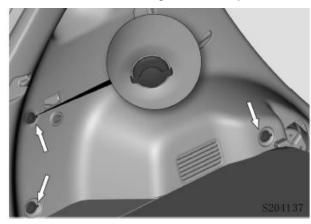
# **WARNING**

Please do not use the cigarette lighter as a power socket; otherwise, the cigarette lighter fuse will be broken.

There are the front socket and the trunk socket. The 12 V DC power is supplied, and the power of electrical appliances shall not be more than 120 W.

# **Clothes Hook**

There are clothes hooks on both sides of the trunk, which can be used to hang or fix the objects.



# **WARNING**

Do not hang anything heavy (over 2 kg) on the hanger; otherwise the hanger may be broken due to overload.

# **Sun Visor**



①-Make-up mirror ②-Fixing base

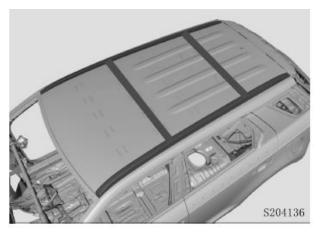
The sun visor will protect the driver and passengers from being affected by the glare.

Turn the sun visor down, and pull the free end of the visor from the retaining seat. Turn the sun visor to the side to block the glare from the side.

# **CAUTION**

Before put the sun visor back, please close the cover of make-up mirror.

# Roof Rack \*\*(if equipped)



When the roof rails are used as a roof rack, use two or more genuine Changan roof bows or the equivalent to cooperate with the roof rails.

### **WARNING**

With goods on the roof rack, please be aware of the following requirements:

- The goods shall not weigh more than 30 kg, and shall be loaded evenly on the front and rear axles.
- The size shall not exceed the total length or width of the vehicle.
- Before and during driving, make sure the goods are reliably secured.
- Avoid sudden starting, sudden turn or emergency brake.

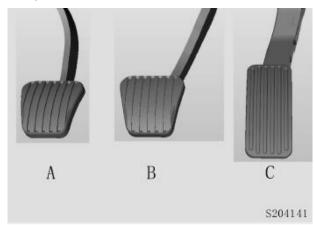
# **Pedal**

# A

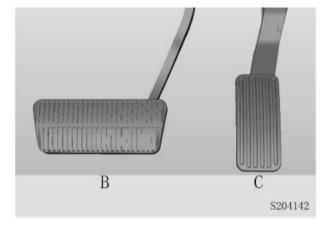
# **WARNING**

- Do not use too much force when pressing the accelerator pedal.
- Do not put anything under the pedal or accessories as they may affect driving if they go under the pedal.

# Sample I



# Sample II



A. Clutch pedal B. Brake pedal C. Accelerator pedal

# **V. DRIVING VEHICLE**

# PRECAUTIONS FOR SUV

This vehicle is an SUV with a high center of gravity and a large ground clearance. It is capable of running in various off-road conditions.

- The high gravity center makes it easier to roll over than other vehicles.
- The large ground clearance provides a better view.
- In order to obtain satisfactory off-road performance, the turning performance of off-road vehicles is no better than that of the small passenger vehicles and low-suspension coupes with the same vehicle speed. Therefore, do not take sharp turns at a high speed as it may result in rolling over.
- Goods on the roof rack will increase the height of the gravity center of the vehicle. Try not to place heavy things on the roof.
- Drive at low speed in the side gust. The appearance and high gravity center of the vehicle make it more sensitive to side. Lowering speed will make control of the vehicle easier.
- It will be the best to go along straight lines when the vehicle is running on steep hills, instead of going across the slope, as the vehicle is more likely to roll over to the side than to the front or the back.

# 🛕 D

# **DANGER**

 When the vehicle is running, all occupants shall wear the seat belts properly. If the vehicle rolls over, the occupant who does not wear seat belt is more likely to get injured seriously or even die.

- Try not to make a sharp turn, drive at a high speed, start in a sudden, apply emergency brake or take a sudden act. Improper operation will cause vehicle out of control or rolling over.
- When the vehicle is running off-road or on a bumpy road, do not run overspeed, bounce, make a sharp turn or hit any object; otherwise, the suspension and chassis of the vehicle may suffer serious damages. It may also cause the vehicle out of control or rolling over.

# PRECAUTIONS FOR VEHICLE WITH SUPERCHARGED ENGINE

- Do not allow the engine to run at a high idling speed for a long time (not less than one hour), for fear of oil leakage from supercharger;
- After the vehicle is parked for a long time under the temperature of -20°C or below, please do not depress the accelerator pedal to the end within 6 seconds after the engine starts.

Failure to conform to the foregoing preventive measures will cause damage or oil leakage to the supercharger, which is not within the scope of warranty.

# PRECAUTIONS FOR DRIVING OFF-ROAD

- Check the engine oil level before driving offroad, and add oil as necessary. Check the wheels and tires. Take folding shovel, wheel wrench and pulling cable, etc. for driving.
- Off-road driving increases the risk of vehicle damage. Please adjust the driving manner based

on the topographic conditions and always drive with cautions.

- Do not put gearshift lever in N position for offroad driving.
- Clean and check the vehicle after off-road driving.
- Clean the brake immediately after off-road driving. When the vehicle is running off road, sand, sludge, water or oil water mixture may enter the brake and aggravate wearing, resulting in degradation of braking performance or fault of brake.
- If there is grinding sound or noticeable degradation of braking performance, please go to a dealer authorized by Changan Automobile for inspection immediately.

# PRECAUTIONS BEFORE DRIVING

# **Before Getting on Vehicle**

- Make sure all windows, mirrors and lamps are clean.
- Visually check the tires for damage and embedded foreign matter. Check whether the inflating pressure is suitable.
- Check whether there is oil leakage at the bottom of the vehicle.
- Check the engine oil level and the level of other fluids.

# **Before Starting of Engine**

Close and lock the doors.

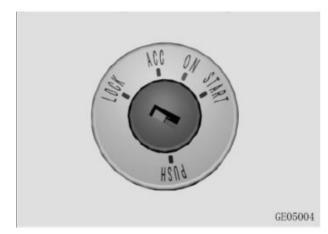
- Check the positions of seats, backrests and headrests, and sit in proper posture.
- Adjust the mirrors.
- Make sure all occupants wear seat belts properly.
- Check the working condition of warning lamp when the vehicle power supply is switched to ON position.
- Release the parking brake, and confirm that the warning lamp is off.

# **After Starting of Engine**

- To warm up the engine, the idling speed is high after cold start, and it is normal.
- When the vehicle is running, if there is sharp friction noise (squeak of metal) after depressing the brake pedal, please go to the nearest dealer authorized by Changan Automobile for inspection and brake pad replacement.
- Listen and check whether there is any leaking sound. If leakage is found, please immediately contact a dealer authorized by Changan Automobile.

# START AND STOP ENGINE

# Ignition Switch \*(if equipped)



# LOCK:

The ignition switch is turned off. After taking out the key, the steering column will be locked.

# ACC:

The steering column is unlocked and the electrical appliances (like radio player) are allowed to work. The engine does not operate at this moment.

#### ON:

All power supplies of the vehicle are on. Warning lamps and indicator lamps light up.

#### START:

Start engine. Release the key right after the engine starts, and the key will immediately return to "ON" position.

#### CAUTION

If it is difficult to rotate the key, rotate the steering wheel leftwards and rightwards slightly first, and then rotate the key.

It is forbidden to leave the key in ignition switch when the switch is turned off, as it may result in battery discharge.

It is also forbidden to leave the key in "ACC/ON" position for a long time, for fear of battery discharge.

After the ignition switch is turned off, the air bag and the automatic retractor of seat belt will not work.

# ▲ DANGER

When the vehicle is running, please do not rotate the key to "LOCK", so as to prevent the steering wheel from being locked, leading to accidents and casualties.

# PASSIVE START **%(IF** EQUIPPED)

# **Before Starting**

- 1. Turn off all unnecessary vehicle lamps and electrical appliances.
- 2. Ensure that the smart key is in the activation area of the vehicle.

# ENGINE START STOP Switch \*\* (if equipped)

See "IV. Vehicle Function - PEPS System - ENGINE START STOP" section.

# **Vehicle Starting**

# **Vehicle with Manual Transmission**

- 1. Fully depress clutch pedal to start. For safety, it is suggested to place the gearshift lever at neutral gear for starting.
- 2. When the indicator lamp on ENGINE START STOP switch turns green, press the switch to start the engine.

### **Vehicle with Automatic Transmission**

- 1. Place the gearshift lever to P (parking) position.
- 2. Press the brake pedal to the end.
- 3. When the indicator lamp on ENGINE START STOP switch turns green, press the switch to start the engine.

# WARNING During driving, do not touch ENGINE START

STOP switch.

Depress brake pedal or clutch pedal to the end until the engine starts. If ENGINE START STOP switch indicator lamp does not turn green, the engine will not start.

After engine starts, drive the vehicle with stable engine speed to warn the engine up, until the engine coolant temperature stays within the normal range.

# **Failure to Start**

After ENGINE START STOP switch is pressed, if the engine cannot start normally, the following may be the causes:

- 1. The communication between the smart key and the vehicle has been interfered, so the key will not be detected, or the key battery runs out. Please start the engine with the methods stated in "IV. Vehicle Function Standby Start".
- 2. With the steering wheel locked, the instrument indicates "Steering lock not released": Press ENGINE START STOP switch, and turn the steering wheel gently at the same time.
- 3. The operation environment, low battery, low fuel level, etc. may also cause the starting failure. If the condition cannot be fixed, please contact a dealer authorized by Changan Automobile for service.

# **Turn off Engine**

#### **Vehicle with Manual Transmission**

When the vehicle speed is less than 3 km/h, press ENGINE START STOP switch, and the engine will stop.

#### **Vehicle with Automatic Transmission**

- 1. Make sure the vehicle is properly stopped, and then apply parking brake.
- 2. Place the gearshift lever to P (parking) position.
- 3. Press ENGINE START STOP switch, and the engine will stop.

If the engine needs to be stopped due to emergency when the vehicle is running, after the vehicle speed drops below 40 km/h, press ENGINE START STOP switch for over 5 seconds.

# **Start Engine (Without PEPS System)**

### **CAUTION**

It shall take not more than 5 seconds to start the engine each time under normal temperature. In northeastern China (with temperature under -15°C), the time taken to start the engine shall be controlled within 10 seconds. If the starting fails, restart after 30 seconds. If the engine keeps failing to start for 6 times continuously, stall the engine and restart it after 10 minutes. If the subsequent starting fails again for several times, contact a dealer authorized by Changan Automobile for maintenance.

# **Start Engine**

1. Ensure that the parking brake has been locked.

- 2. For MT vehicle, place gearshift lever to neutral position; for AT vehicle, place the gearshift lever to P position.
- 3. Turn the key to START position to start the engine.

#### **CAUTION**

- After the engine starts, release the key immediately.
- After the engine starts, do not let the engine idle at a high speed.
- At the moment of cold start, some hydraulic elements (like hydraulic tappet and tensioner) will make metal knocking noise as the engine oil pressure has not been fully established. It is normal. With the engine pressure setting up, the knocking sound will be gone.

#### Failure to Start

During starting process, do not depress the accelerator pedal. If the starting fails for multiple times, the following methods shall be adopted to start the engine:

Hold the gearshift lever in N position. Depress the clutch pedal, and then depress the accelerator pedal gently to 1/4 of its full travel, and then the engine will start. If it fails again, please go to a dealer authorized by Changan Automobile for troubleshooting.

# Engine does not operate or operates at a low speed

1. For AT vehicles, please make sure that the gearshift lever is in N (neutral) position or P (parking) position.

- 2. Make sure the parking brake is pulled up.
- 3. Check the battery connection state, and confirm that the connection is clean and firm.
- 4. Check whether the connection part of starter motor is firm, and whether the starter motor can operate normally.
- 5. Turn on the interior lamps. If the vehicle lamps dim or go out when the starter motor is being operated, it means that the battery is low.

# Engine can run but fail to start

- 1. Check the fuel level.
- 2. When the vehicle power supply is at OFF position, check whether the connection of ignition coil and ignition plug is firm.
- 3. Check the fuel line in the engine compartment.
- 4. If the engine still fails to start, please contact technical personnel from a dealer authorized by Changan Automobile for maintenance.

# A

# **WARNING**

When the starting system is faulted, immediately stop operating the starting motor.

Do not try to start the engine by pushing and towing the vehicle for a long time. Use the auxiliary battery to start (by bonding jumper), so as to protect the three-way catalytic converter from permanent damage.

# **Turn off Engine**

If the vehicle has been running with a high engine load for a long time, the engine may be overheated after it stops. In order to avoid damage to the engine, have it run at neutral position for about 2 minutes before shut it down.

# **WARNING**

disabled, resulting in accident.

- When the vehicle is running, do not shut down the engine; otherwise the performance of power steering or brake booster may be affected as the safety-related functions may be restricted or
- After engine stops, the radiator fan may still be operating for a while. The operator shall be extremely careful to do any operation under the engine hood.
- The automatic transmission shall be switched to P (parking) position after the engine stops.

# **Parking**

The battery may get damaged due to excessive discharging if the vehicle is parked for more than four weeks.

To park the vehicle for a long time, please keep the tire far away from motor, battery and oil, and try the best to protect the vehicle from direct sunlight, rain, high temperature and humidity. Clean and keep the rubber sealing parts properly. Close the doors and lock the vehicle. If the vehicle is parking indoor, it is OK to open a window slightly.

To park the vehicle for a seriously long time, clean and wax the vehicle, and then park it at a dry place with sound ventilation. Check the wax coating of the underbody. Inflate the tires as per the maximum tire pressure indicated by the label. Check the tire pressure once a month, and move the vehicle once a week to change the tire position with which the tire contacts the ground, so as to avoid tire deformation.

# **SHIFTING**

# Gear Shift of Manual Transmission \*(if equipped)



The 1st gear: Pull the lever leftward gently and push it forward;

The 2nd gear: Pull the lever leftward gently and pull it backward:

The 3rd gear: Keep the lever in the middle and push it forward;

The 4th gear: Keep the lever in the middle and pull it backward:

The 5th gear: Push the lever rightward gently and push it forward;

The 6th gear: Pull the lever rightward gently and pull it backward;

R (reverse) gear: Pull the reversing unlocking button on the lever ball upward, and then pull the gearshift lever leftward gently to the utmost position, and then push it forward.

- To shift to R gear, apply the clutch pedal after the vehicle is stopped completely and wait for about 3 seconds, and then shift to the R gear normally.
- It is normal that cold weather will make gear shifting more difficult. When the transmission lubricant rises to proper temperature, such difficulty will be gone.
- With the vehicle stopped, if it fails to shift the lever to "the 1st gear" or "R gear", try to return the gearshift lever to Neutral and release the clutch pedal, and then apply the clutch pedal to try to engage a gear.
- During applying the clutch pedal, do not release the clutch pedal suddenly.

# **WARNING**

- Do not engage a gear if the clutch pedal is not depressed completely; otherwise, the gear shifting will be more difficult, thus causing premature wear to the transmission components or damages to the transmission.
- When the vehicle is running, the clutch pedal shall be released completely. It is prohibited to put foot on the clutch pedal for a rest or park the vehicle on slope by use of the clutch pedal, which will shorten the service life of clutch pedal.
- It is allowed to pull up the reversing unlocking button on the lever ball only when reverse gear is required; otherwise it may cause incorrect gear shifting.
- Do not keep your hand on the gearshift lever when the vehicle is running, or it can cause premature wear to the transmission shifting fork.

#### **DANGER**

While shifting to reverse gear, only start to release the clutch pedal after the reverse prompt is heard (or successful shifting to R gear is confirmed).

# **Gear Shift of Automatic Transmission** \*\*(if equipped)

The automatic transmission has automatic shifting mode and manual shifting mode. The switchover between the shifting modes can be done with the gearshift lever.

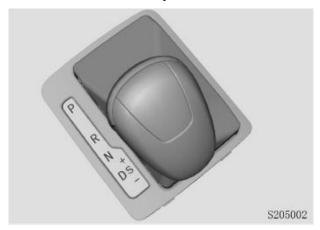
# **M** DANGER

- Before leaving the vehicle, apply the parking brake completely to ensure that the gearshift lever is at P (parking) position. Place ignition switch at LOCK/OFF position.
- Do not use P (parking) position as an alternative to the parking brake.

### **Mode Switch**

Push the gearshift lever rightwards from D position to enter sport mode; under sport mode, push the gearshift lever forwards or backwards to enter manual mode.

# **Gear Position and Operation**



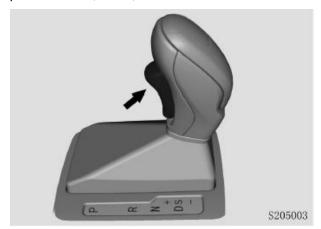
- P Parking, it is possible to start the engine when the lever is in parking position:
- Only when the vehicle is completely static and the EPB switch is pulled up, can the gearshift lever be shifted to this position.
- Release the accelerator pedal, and press the brake pedal to the end, and press the unlocking button on the lever ball to disengage this gear.

# Shift to P position:

- 1. Press the brake pedal to the end.
- 2. Confirm that the vehicle is static, and then pull up EPB switch.
- 3. Shift to N position, and hold it for 3 seconds. Release brake pedal
- 4. Push the gearshift lever to P position, and stop the engine.

Depress the brake pedal. After the engine starts, pull the gearshift lever out of P position for normal

gear shifting. To shift between the following gears, the unlock button on the gearshift lever shall be pressed: $P \rightarrow R$ ,  $R \rightarrow P$ ,  $N \rightarrow R$ .



# **CAUTION**

To extend the service life of the automatic transmission and improve the transmission efficiency at low temperature, the vehicle shall be warmed up for more than 30 seconds after cold start at a temperature under -20°C.

For long time parking, please apply the parking brake, shift to P position and turn off the engine.

For engine-on temporary stop, depress the brake pedal and pull up EPB switch, and then shift to N position.

# **Torque locking of P position:**

If the vehicle is parked on a slope and the gearshift lever is not placed to P position correctly, torque locking may occur. Torque locking of P position is normal; when the vehicle mass applies excessive force to the parking ratchet of the transmission, the

parking ratchet and parking gear will generate greater friction which makes it difficult to pull the gearshift lever out of P position. Such difficulty will be accompanied with impact.

#### **CAUTION**

If the torque locking occurs, and the gearshift lever cannot be pulled out of P position, you can use another vehicle to tow the vehicle in the uphill direction. The pressure on the parking ratchet of the transmission can be offset to a certain extent; thus, the gearshift lever can be pulled out of P position.

#### R - Reserve:

- Only when the vehicle is completely static can the gearshift lever be shifted to this gear.
- N Neutral, it is possible to start the engine when the gearshift lever is in Neutral position:
- When the vehicle is running, the gearshift lever cannot be put into this position whether the engine is operating or not.
- When the running vehicle needs to stop and wait, this gear can be used.
- While towing a vehicle, this gear shall be engaged.

# **CAUTION**

Only when the vehicle cannot be started with gearshift lever in parking (P) position due to fault, it is allowed to start the engine with neutral (N) gear engaged.

#### D - Drive:

The transmission can be shifted automatically among Gear 1 to Gear 6. The engine speed, fuel

consumption and noise will all be under desirable conditions.

- It can be used in all normal driving states.
- When this gear is engaged, the transmission can be shifted to Gear 6 at most.

+/- - shift up/down in manual mode:

Shift up: Push forward

Shift down: Pull backward

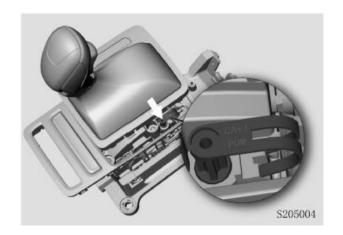
# **Gear Position and Mode Display**

Corresponding information of gear position (letter of P, R, N, D) will be displayed on the screen, and a certain gear (such as Gear 1, Gear 2 etc.) will be displayed in manual mode.

# **Gearshift Locking System**

Locking is possible with gearshift lever in P position. The gearshift lever can be pulled out of P position by depressing brake pedal and pressing unlocking button only when the vehicle power is ON or the engine starts.

It unlocking method fails, please do unlock manually. Remove the gearshift cover plate and use a tool to press the manual unlocking button.



# A

#### **WARNING**

- When the vehicle is running or towed, never shift to P position, or the parking locking pin will be broken and the transmission will be damaged.
- It is forbidden to have the vehicle coast with gearshift lever in N position; otherwise the oil pump may not be able to pump for lubricating, and that will result in serious damage of transmission components due to high temperature inside the transmission!
- To drive in an opposite direction, please always engage a gear after the vehicle fully stops; otherwise the transmission will be damaged.

#### **CAUTION**

When the vehicle is running, if the instrument indicates fault of transmission system, or transmission fault indicator lamp lights up without noticeable abnormality or impact of gear shifting, please go to the nearest dealer authorized by Changan Automobile for maintenance as soon as possible.

When the vehicle is running, if the instrument indicates fault of transmission system, or transmission fault indicator lamp lights up, accompanied with noticeable impact and suspicious noise of gear shifting, please park the vehicle at a safe location, and call a tow truck to tow the vehicle to the nearest dealer authorized by Changan Automobile for maintenance as soon as possible.

When the vehicle is running, if the instrument indicates fault of transmission system, or transmission fault indicator lamp lights up, accompanied with loss of drive, please park the vehicle at a safe location, and call a tow truck to

tow the vehicle to the nearest dealer authorized by Changan Automobile for maintenance as soon as possible.

# **BRAKE**

# **Front and Rear Disc Brakes**

Hydraulic disc brake is adopted for this vehicle. The driver may depress or release the brake pedal to apply or release brake of vehicle.



#### WARNING

- Before driving, please make sure the indicator lamps for brake system are all functioning right.
- The brake lining is equipped with wear indication device: If there is metal scraping sound (spring piece scrapes brake disc) when brake is applied, go to a dealer authorized by Changan Automobile for inspection and repair immediately.
- Do not keep driving if the wear limit of brake lining is achieved; otherwise it may cause accident easily.

# **Electrical Parking Brake (EPB)**

Functions of EPB include static parking, drive away assist, high temperature reengaging and dynamic parking.

# **Static Parking**

After the vehicle fully stops, pull up EPB switch, and the parking brake will engage tightly. EPB indicator lamp on instrument lights up (in red) and the indicator lamp on EPB button lights up (in vellow) too.



When the parking brake is released, depress the brake pedal first, and then press EPB button. Parking brake will be released and the corresponding indicator lamp will go out.

It is normal to have working noise when the parking brake is engaged or released.

### WARNING

- During driving, do not touch electrical parking brake (EPB) button arbitrarily.
- Do not place heavy things on the switch.
- The driver shall park the vehicle properly to ensure safety before leave the vehicle.
- If it is necessary to replace the lining for the rear brake caliper, please contact a dealer authorized by Changan Automobile.

# **Drive Away Assist (DAA)**

DAA is an auxiliary function of EPB. When DAA is working, there is no need for driver to press EPB button since EPB can release parking brake automatically when the condition is satisfied.

Operating conditions of DAA: Driver wears seat belt,

and the driver's door is closed properly.

For manual-transmission model, it is necessary to apply the accelerator pedal moderately when releasing the clutch pedal.



# **WARNING**

- DAA is applicable to reversing. Please ensure safety.
- When using DAA for a MT vehicle, please be careful with the gear. The vehicle may slide if the clutch pedal is released and the accelerator pedal is depressed at the same time, with gearshift lever in neutral position.

# **High Temperature Reengaging (HTR)**

HTR is an auxiliary function of EPB. Multiple braking operation will cause brake disc overheat. To ensure parking security, HTR will be activated automatically and conduct automatic reengaging at regular interval after vehicle stops, to ensure the effectiveness of parking. It is normal to have working noise at the moment.



### **WARNING**

Try to park the vehicle on flat road after several continuous braking to ensure parking security.

# **Dynamic Brake Function (DBF)**

DBF is an auxiliary function of EPB. Emergency brake can be applied by keeping lifting EPB switch.



#### WARNING

DBF can be used only in case of emergency.

# **Anti-lock Brake System (ABS)**

In case of emergency or when the vehicle is running on wet slippery road, ABS will prevent the wheels being locked, so as to maintain the steering capability and running stability of vehicle, and to enhance the controllability of vehicle at the time of braking.

When ABS is working, the brake pedal will vibrate (apply impact on foot), and there will be operating sound of ABS motor in the engine compartment. This is normal.

After vehicle ignition, when the vehicle speed reaches 10 km/h for the first time, ABS will carry out dynamic self-inspection, and make operating sound. It is normal.

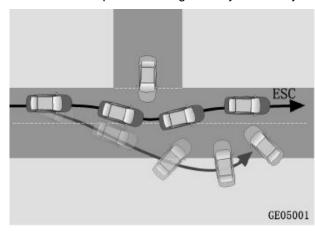
# **Traction Control System (TCS)**

When the vehicle is running on a smooth road pavement or on a mountain road, TCS, by detecting the drive wheel slipping, can control the wheel brake torque and engine output torque to maintain the traction of wheels, prevent or reduce the drive wheel slipping, and improve the running stability, acceleration performance and gradeability of vehicle.

If the vehicle gets trapped in snow, mud or sand, it is better to turn off TCS to restore engine output torque, so as to increase the power to get out of the trap.

# **Electronic Stability Control (ESC) System**

ESC use sensor to monitor the vehicle condition and improves the running stability of vehicle by controlling wheel brake torque or engine torque when the vehicle is in critical stable state, like rapid steering or urgent lane changing. It reduces risk of accident and improves driving security effectively.

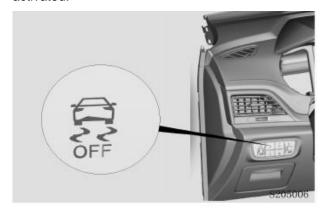


When ESC is working, ESC multifunction indicator lamp will blink, the brake pedal will vibrate slightly and there will be operating sound of ESC motor in the engine compartment, which is normal.

Each time the ignition switch is turned on, ESC system will conduct self-inspection when the vehicle speed reaches 10 km/h. It will also make operating sound, which is normal.

#### Turn On/Off

Press ESC\_OFF switch gently, and ESC\_OFF indicator lamp on instrument will light up. Turn off ESC and TCS. Press ESC\_OFF switch again, and the indicator lamp will go out. TSC and TCS are activated.



# **Hill Decent Control (HDC)**

When there is steep hill or continuous downhill sections ahead the vehicle, the driver may press

HDC switch . ESC will hold the vehicle speed within a stable range:

- Depress brake pedal or accelerator pedal as needed to hold the vehicle speed between 8 and 35 km/h. Release the pedal, and the vehicle will run on the hill stably at the current speed.
- With ESC controlling the vehicle speed, you may be able to focus on the steering wheel and drive through the hill safely and quickly.

#### **CAUTION**

After the engine starts, ESC function is activated by default. For the sake of driving safety, it is

recommended to activate ESC function. Only under special conditions, it is suggested to inactivate the function:

- The vehicle is running with tire chain.
- The vehicle is running on thick snow or floppy road.
- The vehicle is trying to get out of trap.

# **▲** ∨

# WARNING

ESC and TCS provide better safety performance. However, it is always the driver's responsibility to drive with cautions!

When the vehicle is running, keep a proper distance. Do not be blindly confident on the brake distance.

The stability control ability of ESC is closely connected with brake system, suspension system (such as tire), steering system and electrical system. Refitting the vehicle arbitrarily may result in reduction or failure of ESC function.

# **Hill-start Hold Control (HHC)**

HHC helps the driver to start more comfortably on a slope. After the brake pedal is released, system will keep the vehicle static for a short time, so that the driver will have sufficient time to depress the accelerator pedal to start the vehicle, so as to prevent vehicle slipping.

# A

### WARNING

• If the vehicle fails to start after a while, or the driver depresses the accelerator pedal with only a slight force, HHC will not hold the vehicle static any more, and there will be possibility of vehicle slipping at the moment, resulting in risk of accident and personal injury.

• If the driver's door is opened while HHC is working, HHC will be inactivated immediately and the vehicle will coast on slope.

### **CAUTION**

- HHC function is activated by default when the vehicle is delivered out of factory. To inactivate the function, please contact a dealer authorized by Changan Automobile.
- When HHC is operating, it is normal to have clicking sound of solenoid valve.
- HHC will increase pressure actively. If the brake pedal is depressed with a small force, HHC may not operate.
- Please come to a dealer authorized by Changan Automobile for check and repair if there is any fault of electrical stability control (ESC) system.

# **Auto Apply**

After the vehicle is turned off and powered off, there is no need for the driver to pull up the EPB switch. EPB will automatically park the vehicle to achieve the parking function.

# **CAUTION**

To ensure safety, please confirm that the automatic clamping function works before leaving the vehicle. The vehicle will behave as follows when it is parked automatically:

- After the flame is off, the indicator light of the handbrake button stays on for 10 s.
- After the flameout, the red parking P lamp on the meter lights up for 10 seconds.
- The rear brake emits a motor operating sound for about 2 seconds.

If EPB doesn't automatically pull up after the

flameout, please continue to press the EPB switch (hold for more than 3 s), and at the same time the vehicle is turned off, the flameout automatic parking function of this ignition cycle can be cancelled.

# Hydraulic brake assist (HBB)

When the vacuum is poor, in order to prevent the brake pedal from hardening, ESC actively provides auxiliary braking force when the driver steps on the brake to help the brake.

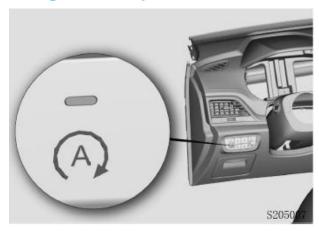
HBB is more likely to trigger in plateau area or high load operation (such as air conditioning), which is a normal phenomenon;

When HBB is triggered, the brake pedal may vibrate due to hydraulic fluctuation, and ESC has the working sound of solenoid valve and motor, which is normal.

# **IDLING START-STOP %(IF EQUIPPED**)

Idling start/stop function may shut down the running engine during parking process. It is quite practical in front of red traffic light or in traffic jam. It can reduce fuel consumption, exhaust emission and engine noise.

# **Idling Start-stop Switch**



Press the switch, and the green lamp will light up. The idling start-stop function is activated. Press the switch again, and the green lamp will go out. The idling start-stop function is inactivated.

# **Idling Start-Stop Status Indication**

There are three statuses showing on the instrument

for idling start-stop status indicator lamp (A):



- 1. ON→The function is enabled but the current condition does not allow start/stop.
- 2. OFF→The function is disabled, or the current

condition allows normal start/stop.

3. Long ON after flashing→The system is faulted. Please contact a dealer authorized by Changan Automobile for maintenance.

# **Idling Start-stop Function**

Use idling start-stop function with the following operations:

- 1. Enable the idling start/stop function, and the vehicle starts and runs. When water temperature is above 60°C and the speed is over 10km/h, the idling start-stop indicator lamp goes out;
- 2-1. For MT vehicle: In front of a red traffic light or a temporary stop is required, release the accelerator pedal, apply the clutch pedal and shift to Neutral; after the vehicle stops, release the clutch pedal, and the engine will stop automatically;
- 2-2. For AT vehicle: With gearshift lever in D or N position, release the accelerator pedal, and depress the brake pedal. After the vehicle stops, the engine will stop automatically:
- 3-1. For MT vehicle: When the vehicle is about to start, depress the clutch pedal, and the engine will start immediately; meanwhile, the idling start-stop indicator lamp lights up;
- 3-2. For AT vehicle: When the vehicle is about to start and the gearshift lever is in D gear, release the brake petal, or push the gearshift lever from N position to D position, and the engine will start automatically; meanwhile, the idling start-stop indicator lamp lights up;
- 4. When the speed is over 10km/h again, the idling start-stop indicator will go out; at this moment, the function can be enabled normally.

# **Automatic Start-stop under Particular Conditions**

The system will start/stop under the following conditions:

• Idling start-stop switch triggers automatic shutdown.

When the vehicle returns to idling status after running for a while, if the conditions for automatic shutdown are satisfied, press the idling start-stop switch, and the engine will shut down automatically.

• Engine shuts down automatically as there is no operation for a long time.

After the engine starts automatically, if neither the clutch pedal nor accelerator pedal is depressed within 15s, and there is no gear shifting operation either, the engine shuts down automatically (for MT vehicle).

• Accelerator pedal triggers automatic startup.

When the engine shuts down automatically and the transmission is kept in Neutral, depress the accelerator pedal, and the engine will start automatically at once.

• Idling start-stop switch triggers automatic startup.

When the engine shuts down automatically and the transmission is kept in Neutral, press the idling start-stop switch, and the engine will start automatically at once.

Coasting triggers automatic startup.

After the engine shuts down automatically, if the coasting speed of the vehicle is over 5 km/h, the engine will start automatically.

Low battery triggers automatic startup.

After the engine shuts down automatically, if the battery power is lower than the safety limit, the engine will start automatically to avoid the battery power continuing to go down and causing start failure.

• Insufficient vacuum degree triggers automatic startup.

After the engine shuts down automatically, if the vacuum degree in vacuum booster is inadequate (it is usually caused by repeated depressing brake pedal to stop the vehicle), the engine will start automatically at once.

Stalling triggers automatic startup.

When the engine stalls, engage the gearshift lever to neutral position first, and then depress the clutch pedal, or depress the clutch pedal to the utmost directly, after that, the engine can start automatically at once (for MT vehicle).

• Rotating steering wheel/opening left front door triggers automatic startup.

After the engine shuts down automatically, if the steering wheel is turned for a large angle or the left front door is open, the engine will start automatically (for AT vehicle).

# **Precautions**

1. Idling start-stop function may not work under the following conditions:

The vehicle starts cold and the coolant temperature does not reach 60°C;

The vehicle speed is not more than 10 km/h;

The battery is low;

It starts automatically to much;

The driver side door is open (for MT vehicle).

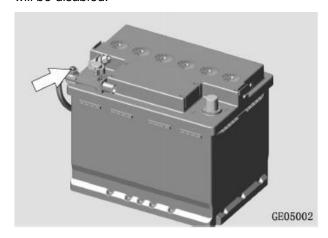
The vehicle is in steering process or the steering angle is unduly large (for AT vehicle).

The vehicle parks on a steep slope (for AT vehicle).

If so, the idling start-stop indicator lamp on the instrument will keep being on, and start/stop is not allowed, which is normal.

- 2. If the driver side door is open after automatic shutdown, it is only allowed to start the engine with key;
- 3. If it is required restarting the engine during shutdown process, it may take a while for the engine to start automatically after the clutch pedal is depressed;
- 4. If the battery power is lower than safety limit, the system will forbid engine shutdown to avoid start failure.
- 5. During maintenance, do not remove the battery sensor (if it is necessary to cut off on-board battery supply, disconnect the harness on the battery sensor end);
- 6. If the battery sensor power is cut off, the startstop system can work only after the following conditions are satisfied:
- All electrical appliances are turned off, and the vehicle is kept locked and static for more than 4 hours;
- It starts successfully for at least four times continuously.
- 7. With the original battery not removed, if external power or external battery is needed to start the vehicle, please connect the external negative pole

to the stud of battery sensor (as indicated by arrow in figure). Failing to do so, the battery sensor will not be able to detect current, resulting in battery status error. In such case, idling start-stop function will be disabled.



8. The battery and battery sensor that conform to the manufacturer and model requirement of Changan Automobile must be used. They cannot be replaced without permission; otherwise, the idling start-stop function may be affected.

# **DRIVING ASSISTANCE**

# Electric Power Steering (EPS) System

EPS can relieve the driver's effort of turning the steering wheel effectively and make the low-speed steering easy and high-speed steering steady, so it is helpful to improve the driving comfort and steering stability, and also to lower the fuel consumption at the same time.

Under the following conditions, EPS warning indicator lamp will not light up, but the driver may feel heavy to turn the steering wheel, and that is normal:

• The vehicle is in static state, and the driver operates or turns the steering wheel frequently for a long time:

The effect of EPS will be weakened to avoid overheat of the system. At this moment, try not to turn the steering wheel before the system cools down.

# **WARNING**

When the vehicle stays still, EPS may be damaged by turning the steering wheel frequently for a long time.

# The battery power runs out:

Inspect the battery. Charge the battery or replace it as necessary.

# **CAUTION**

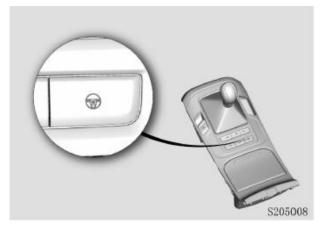
There may be operating sound (buzz) of EPS motor when the steering wheel is turned, which is normal.

Do not remove or replace the steering gear, steering column or steering wheel without permission. If it is necessary to do so, please contact a dealer authorized by Changan Automobile.

# **WARNING**

When the steering wheel is turned to its limit, do not hold it there for over 10 seconds; otherwise, EPS motor will be damaged.

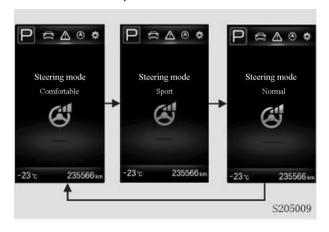
# Multi-Power Steering Mode % (if equipped)



Under multi power steering mode, you may control the steering force based on your driving habit or road condition. With steering mode button on console, you may choose various steering mode:

- Comfortable mode, slight operating force for steering
- Normal mode, medium operating force for steering
- Sport mode, heavy operating force for steering

Press the mode button, the selected steering mode will be displayed on the screen. If the button is pressed within 5s, the screen switches over in cycle as per the sequence shown below. If the button is not pressed within 5s, the screen with switch back to the previous interface.



After the engine starts, multi power steering will stay in the mode chosen before the last shutdown. However, disconnect the battery and connect it again, and it will turn to normal mode by default.

# **CAUTION**

- To change the mode during driving, please do it with cautions.
- When EPS cannot function right, multi power steering mode cannot function either.
- If the mode button is pressed when the steering wheel is under control, the steering force will not change immediately. The steering mode switches when the steering wheel is in middle position.

# **DRIVING TIPS**

# **Running-in**

Complex running-in procedure is not necessary for this vehicle model; however, to improve performance, fuel efficiency and service life of the vehicle, it is suggested to follow the tips below when the vehicle is running for its first 1,600 km (the running-in distance):

- After startup, do not have the engine run at a high speed. Warm the engine up slowly and start the vehicle smoothly; rapid acceleration is prohibited.
- Do not maintain a certain speed (high or low) for a long time; it is preferred that the vehicle within running-in period shall get through various engine speeds to fully break in the engine.
- Due to restrictions of manufacturing, the adhesion performance of new tires is not the best at the time. Therefore, please drive with cautions for the first 300 km.
- The desired wear and bearing capacity of brake disc and brake lining can be achieved after the vehicle runs for 500 km. Try not to apply emergency brake, especially within the first 300 km.
- Do not drive with low gear at high speed or drive with high gear at low speed (for MT vehicle).
- Try not to use the vehicle as a trailer for the first 1.600 km.

Maximum speeds recommended for MT vehicles within running-in period:

Gear	Vehicle speed (km/h)
Gear I	20

Gear II	30
Gear III	50
Gear IV	70
Gear V	90
Gear VI	110

Precautions for running-in of AT/AMT vehicles:

- Drive with gear shift lever in D (drive) position.
- Drive with a speed not more than 100 km/h.
- See precautions for MT vehicle if the vehicle is under manual mode.

# **Driving at High Speed**

- Keep normal tire pressure.
- The higher the vehicle speed is, the longer the brake distance will be. Control the brake pedal depending on the speed.
- Keep an adequate distance from the vehicle ahead.
- When the vehicle is running through a mountain pass, or overtaking a trunk, or getting through a tunnel, please always slow down as the vehicle may be affected by lateral wind.

# A

### **DANGER**

It is prohibited to drive at a high speed at night, in rain, in water or on slippery road.

# **Driving at Night**

- Try not to drive at a high speed, and keep an adequate distance from the vehicle ahead.
- Adjust the position of rearview mirror before driving to reduce glare.

- Make sure the headlamps are clean before driving; otherwise it may affect the sight.
- Inspect whether the turn signal lamp, horn and other equipment are intact before driving.

# **Driving in Rain**

- Driving at low speed: Heavy rain may affect the driver's view and increase the braking distance.
- Check the wiper before driving.
- Check the tire before driving, as the poor condition of tire may result in vehicle slipping and even car crash.
- Depress the brake pedal repeatedly during driving to remove the moisture on the surface of brake disc and brake lining until normal brake effect is regained.

# A

# **DANGER**

Be sure to turn on the headlamp when driving in rain so that others can identify the vehicle.

# **Driving in Water**

- Try to avoid pit and ponding during driving to prevent the water from entering the engine.
- Minimize the speed, and try to have wheels on both sides (left and right) go through the water at the same time if it is inevitable, and brake pedal shall not be depressed for fear of side slipping.
- Do not drive in water which is deeper than the limit, or drive in water with a speed higher than walking speed; otherwise the engine, electrical system and transmission may be damaged.

• After driving through the water, gently depress the brake pedal repeatedly to restore the brake in dry condition.

# **Driving in Mud**

- Try not to drive at a high speed.
- Try to avoid using severely worn tires.
- Maintain the vehicle after long distance driving in mud.

# **Driving on Slope**

- When the vehicle is going uphill, shift down to a low gear rapidly based on the gradient and engine speed, so as to increase engine torque and to avoid engine damage due to overload.
- To start the vehicle on a slope, try not to depress the clutch gently while depressing the accelerator pedal hard; otherwise it may cause burnout of clutch.
- When going downhill, shift to a low gear and use the engine for braking.
- Never have the engine run at an excessively high speed.

# A

#### **DANGER**

If the vehicle is running downhill on a steep or long slope, do not depress the brake pedal for a long time or at a high frequency; otherwise the brake may fail to work due to overheat.

Coasting with gearshift lever in N position is prohibited when the vehicle is running on a slope.

# **Driving in Winter**

When the winter comes, please conduct winter maintenance for the vehicle. Make sure to drive in

a way which is appropriate to the common weather condition of winter.

- Use fluids (such as engine oil, engine coolant and washing fluid) suitable for outside temperature;
- Check the battery condition;
- It is recommended to take necessary emergency supplies (like tire chain, window scraper, sand bag or salt bag, signal flasher, shovel, etc.) based on the condition of destination:
- It is recommended to use snow tire for driving on snow. Try not to use severely worn tire;
- Check and remove accumulated snow on the vehicle:
- Always slow down the vehicle in advance, and try not to depress the brake pedal frequently.
- Do not use parking brake when parking. Parking brake may be frozen, and that will make it difficult to release the parking brake. The transmission shall be shifted to P position (for AT vehicle), the 1st gear or reverse gear (for MT vehicle).
- It is suggested not to park the vehicle on a slope. If it cannot be avoided, block the wheels to prevent sliding by accident;
- Use tire chain properly.



#### **DANGER**

It is prohibited to drive at a high speed in snow or on slippery road.

It is prohibited to start in a sudden, accelerate rapidly, make a sharp turn or apply emergency brake in snow or on slippery road.

Try to park the vehicle on flat road.

Do not try to gain extra engine braking effect by

shifting down when the vehicle is running on a slippery road. To do so, the drive wheels may loss the road grabbing, increasing the risk of slipping and accident.

#### **Economic Driving**

The following measures may help to reduce the fuel consumption and emission.

- Please activate the idling start stop function (if equipped).
- Try not to have the vehicle idling too much: During a short waiting in driving process, the parking brake may be applied before the vehicle starts again.
- Try not to start at a high speed: Starting at a high speed may increase unnecessary fuel consumption and shorten the engine's service life.
- Drive with foresight: Avoid unnecessary acceleration, braking and parking, so as to reduce fuel consumption.
- Keep air filter and filter element clean: If the air filter or the filter element is dirty, it will prevent air from entering the engine, and the proportion of fuel and air will be imbalanced, which causes incomplete combustion.
- Minimize load: Extra mass will increase fuel consumption.
- Check tire pressure regularly: Low tire pressure will increase the running resistance, which not only causes waste of fuel, but also aggravates tire wearing.
- Close sunroof or window: The open sunroof or window may increase air resistance, and further increase fuel consumption.

- Coast with inertia: When the vehicle is approaching the red light or running downhill on a slope with great gradient, release the accelerator pedal to have the vehicle coast with inertia. The fuel supply is interrupted at the moment.
- Try not to drive at a high speed: Low revolving speed and constant vehicle speed may reduce fuel consumption and minimize the wearing.
- Conduct maintenance regularly: Regular maintenance can guarantee the long service life and optimized economic efficiency of the vehicle.

## **VI. EMERGENCY**

#### **CAUTION**

The vehicle tools and warning facilities listed in this book are only for reference. If there are any differences, please refer to the actual vehicle configuration.

#### **ROADSIDE ASSISTANCE**

### **Hazard Warning Flasher**

Hazard warning flasher switch ( ) is in the A/C control panel of console.

Press the switch, and Hazard warning flasher will light up, and the left and right turn signal lamps will flash. Press the switch again, the lamps will go out.

If emergency brake is applied when the vehicle is running at a speed of 100 km/h, Hazard warning flasher will light up automatically to remind the vehicle behind of deceleration. If the vehicle speeds up or Hazard warning flasher switch is pressed at this moment, Hazard warning flasher will go out automatically.

With ignition switch OFF, the Hazard warning flasher still works.

#### **CAUTION**

Hazard warning flasher will not light up automatically when the vehicle speed is less than 100 km/h or upon a slight brake. For automatic activation of Hazard warning flasher, the function may be disabled, or the deceleration parameters may be adjusted in a dealer authorized by Changan Automobile.

### Triangle reflector \*\*(If equipped)



Triangle reflector is place in the storage box at the backside the trunk carpet.

#### Reflective Vest \*\*(If equipped)



Reflective Vest is in the glove box in front of the front passenger seat. Please take it out and put it on in case of emergency.

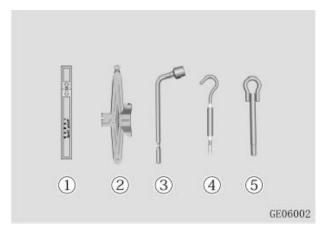
#### **CAUTION**

In case of parking upon emergency, take out and set up the Triangle reflector × (If equipped).

The Triangle reflector ※ (If equipped) shall be placed at a certain distance (indicated by X) based on road conditions. On a common road, 50 m≤X≤100 m; on an expressway, X≥200 m; in rain or fog, X shall be increased to 200 m; at light, X shall be increased for about 100 m on the basis of corresponding road conditions. Meanwhile, Hazard warning flasher shall be turned on.

#### **In-vehicle Tools**

In-vehicle tools are placed in the trunk tool storage box. Open the cover plate of the box to access the tools.



Triangle reflector \* (If equipped)

- ② Jack (only applicable to tire replacement upon emergency)
- 3 Wheel nut wrench
- (4) Jack rocker
- 5 Towing hook

#### **M** DANGER

Do not repair the vehicle on a driving lane.

In case of parking upon emergency, take out the Reflective Vest and put it on properly.

To replace the tire, drive the vehicle away from the lane and park it on road shoulder. Put on the Reflective Vest properly and use the jack on flat and hard road surface.

Confirm the front and rear jack lifting locations. Do not support the jack on the lower guard of side wall or other places.

It is prohibited to have any body part go under the vehicle which is supported by the jack only. If you have to go under the vehicle, use a vehicle supporting seat. Any operation without caution may result in vehicle underbody falling off from the jack, causing severe injuries or even death.

Do not start the engine while the vehicle is lifted.

Make sure there is no one left inside the vehicle when the vehicle is lifted. Always keep children away from driving lane and jacked up vehicle.

#### **Tire Replacement**

### A

#### **DANGER**

To replace the tire, drive the vehicle away from the lane and park it on road shoulder. Use the jack on flat and hard road surface; if it is impossible to do so in current situation, contact a dealer authorized by Changan Automobile.

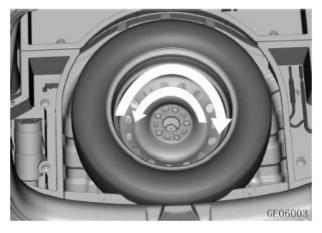
#### **Preparation**

- Park the vehicle on a solid, flat and level road;
- The parking brake is applied;
- Have the front wheels rotate to correct positions;
- Place gearshift lever of AT vehicle to P (parking) position, and place gearshift lever of MT vehicle to R (reverse) position;
- Stop the engine;
- Turn on the Hazard warning flasher;
- Take out the spare tire and tool kit.
- Place blocks in front and at back of the tire in diagonal direction of the tire to be replaced to prevent the vehicle from sliding.

#### WARNING

Before lifting the vehicle, the parking brake must be applied and blocks must be placed to avoid the vehicle from moving during tire replacement.

#### **Removal and Storage of Spare Tire**



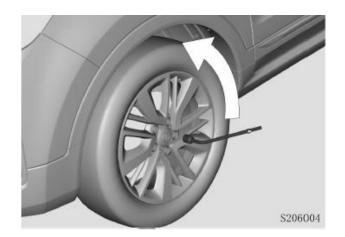
Rotate the bolt of spare tire clamping plate counterclockwise to remove the spare tire.

Rotate the bolt clockwise to fix the spare tire or the old tire from replacement.

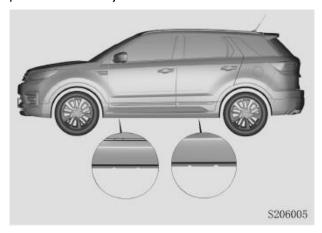
The tightening torque value of the spare tire bolt is  $100\sim120\ N\cdot m$ .

#### **Tire Replacement**

1. Loosen the wheel nuts in sequence by rotating them counterclockwise for a circle, but do not loosen them completely.



2. Set up the jack at the position which is closest to the front/rear lifting position of the tire to be replaced. The lifting position refers to the middle point between two clear gaps of the lower seam allowance of the door sill closer to the tire. Engage the slot on jack to the seam allowance of lifting position to fix the jack.



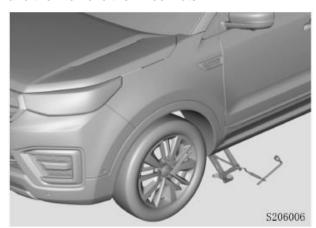
#### **DANGER**

To lift the vehicle, it is only allowed to use the jack provided together with the vehicle, and please always choose the right lifting position. If the jack is used in an improper way, the vehicle may roll over after it is lifted.

The jack must be placed on a solid, flat and slidingproof surface.

Do not use a wooden block or similar object as the support for jack; otherwise the jack may not gain proper bearing capacity due to the limit of height. Make sure the tire is at most 3 cm away from the ground.

3. Insert the jack rocker into the jack, and rotate it clockwise with wheel nut wrench to lift the vehicle, and then remove the wheel nuts.

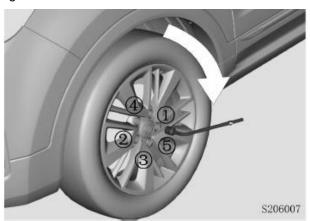


- 4. Remove the wheel and lay it down.
- 5. Clean the contact surface of wheel and hub.
- 6. Place the spare tire on the hub and push it in position.

#### DANGER

The wheel and wheel casing may have sharp edges, and please operate with caution. Before installing the wheel, make sure that there is no foreign matter (such as soil, tar, sand, etc.) in the hub or wheel, as such matter may cause trouble to install the wheel to the hub.

- 7. Install the wheel nuts and tighten them by hand. Make sure the small end of nut facing inside.
- 8. Use a wheel nut wrench to preliminarily tighten the nuts clockwise, and then lower the vehicle.
- 9. Tighten the wheel nuts in the sequence shown in the figure, and make sure all nuts are fully tightened.



#### **CAUTION**

To replace bolts or nuts, please use the bolts or nuts with the same metric threads and chamfers. Nuts or bolts with other threads than metric ones may damage the bolts or nuts, resulting in failure of wheel fixing.

Before install the wheel nuts or wheel, please

check the wheel type carefully. Please consult a dealer authorized by Changan Automobile in case of any problem.

#### A

#### **DANGER**

Tightening bolts or nuts with the vehicle lifted may cause the vehicle falling off from the jack. It is only allowed to fully tighten the bolts or nuts after the vehicle is lowered to the ground.

The damaged nuts and bolts will loss the capacity of fixing the wheel, which can cause the vehicle out of control and accident, resulting in injury and even death.

After tire replacement, go to a dealer authorized by Changan Automobile as soon as possible to have the wheel nuts tightened to specification.

The spare tire is not a full-size tire, and is only for emergency use. It is prohibited to use the spare tire for long-time and long-distance trip. With the spare tire installed, the vehicle shall run at a speed not more than 80 km/h.

#### **CAUTION**

If the front tire is damaged, please use the spare tire as rear tire and replace the front tire with the rear tire.

After installing the spare tire, check the inflation pressure and adjust it to the specified value as soon as possible.

Place the removed tire to the spare tire box, and place the tools back.

After repair is done, make sure the wheel bolts of the original length are used for installation of genuine tire.

#### **Wheel Nut Tightening Torque**

The wheel nut tightening torque is 100~120 N·m.

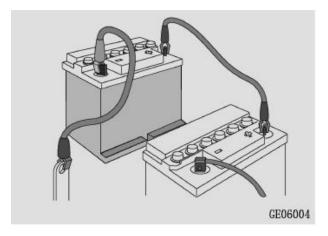
Remove the valve cover, and use the tire pressure gauge to check the pressure. If the pressure is low, decelerate and drive to the nearest dealer, and inflate the tire to the specified pressure. After pressure inspection and adjustment, install the valve cover.

### **Jump Start**

#### **CAUTION**

It is only allowed to start the vehicle with 12 V battery.

- 1. Place the battery for power supply near the vehicle. If the battery of other vehicle is used, the vehicle of power supply shall be close to, but not contact with, the engine hood of the vehicle lack of power. Parking brake of both vehicles shall be applied.
- 2. Check all terminals of battery before connecting the battery cables. Remove the sections with excessive corrosion, and make sure all hole covers are tightened and leveled.
- 3. Turn off all accessories except the ones necessary for safety indication (like headlamp and Hazard warning flasher).
- 4. Connect one cable to the positive poles of both the battery for power supply and the battery lack of power, and connect another cable to the negative pole of the battery for power supply and the engine ground (exposed metal of engine) of the vehicle lack of power. Keep the cable away from battery and fuel injection system.



- 5. If vehicle rescue is used, start the engine of vehicle for power supply and have it run at a stable speed.
- 6. Start the vehicle lack of power.
- 7. Remove cables in the reverse sequence of connection. Keep cables away from metal parts of any vehicle when remove the cables.

#### A

#### **WARNING**

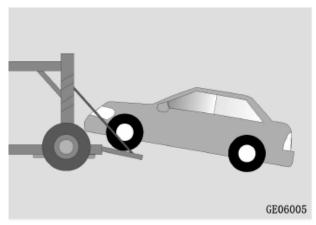
If the battery has been frozen, never jump-start the vehicle; otherwise, the battery may explode or break down.

Do not directly connect the cable with the negative pole of the battery lack of power; otherwise, it may explode.

To jump-start the vehicle, keep the hands and the cables away from the belt pulley, belt, fan and other revolving components.

If the battery is often under voltage without a clear cause, contact a dealer authorized by Changan Automobile for maintenance.

#### **Towing and Lifting**



Do not tow the vehicle with its rear axle lifted up; otherwise the steering wheel will act.

The boost system will not work if the engine is not running. Great force is required to apply the brake or make a turn.

Do not lift the vehicle with the towing hook, vehicle body or chassis component as the force bearing point; otherwise damage will be caused.

Do not tow the vehicle backward with the front wheels on the ground; or the vehicle may be damaged.

Try not to start in a sudden or drive unstably, because excessive stress may be applied on the emergency towing hook, steel cable or chain, causing breakage of the hook, cable or chain, resulting in vehicle damage and personal injury.

If the vehicle cannot be moved as it is out of control, do not continue the towing in force manner.

Please try to advance straightly during towing.

### Vehicle for Road Transportation and Roadside Assistance

When towing service is necessary, we recommend dealers authorized by Changan Automobile or professional towing service providers.

It is suggested to use lifting equipment and flat/platform equipment with wheels. To tow a vehicle without a platform trailer, the connection to the towing equipment must be made with rigid connector. It is forbidden to use towing cable.

To tow an FWD vehicle with vehicle for roadside assistance, suitable wheel lifting equipment shall be used to lift the front wheels above the ground, or the front wheels shall be placed on the platform of a platform trailer, so as to avoid damaging the transmission. At this moment, the front wheels are above the ground and the rear ones stay on the road.

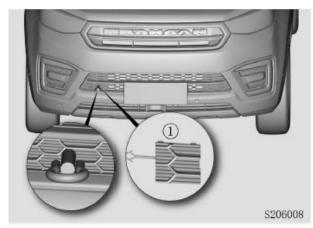
#### **Towing Point**

#### **CAUTION**

If the vehicle is towed with any part of vehicle other than the towing hook, it may be damaged.

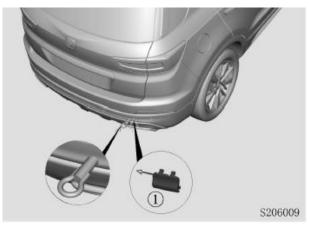
Only specified steel cable or chain can be used for towing. Fix the specific steel cable or chain on the towing hook.

#### **Front Towing Point**



Pry up the towing hook mounting cover (1) of the front bumper, and then open the cover plate. Screw the front towing hook tightly and then use it for towing.

#### **Rear Towing Point**



Pry up the towing hook mounting cover of the rear bumper, and then open the cover plate. Screw the rear towing hook tightly and then use it for towing.

#### **Towing with Four Wheels on Ground**

This is only applicable for short trip at a low speed on road with hard pavement, and under the condition that the wheels, axles, powertrain, steering wheel and brakes are all in good state.

- The towing vehicle shall not be lighter than the towed vehicle; otherwise the vehicle may be out of control.
- Check and make sure the hook is free from breakage or damage.
- Fix the steel cable or chain for towing on the hook.
- Do not yank the hook. Apply stable and even force.
- Turn on the ignition switch of the towed vehicle, and place the gearshift lever in N position, and release the parking brake.
- Always tow the vehicle from the front side to avoid damaging the hook.
- The towing cable shall be less than 5 m (16 feet) and shall be tied with noticeable cotton tape for recognition.
- Drive with caution to avoid the towing cable being slack in the process.
- Drivers in two vehicles shall exchange information frequently.
- If the vehicle runs downhill for a long distance, the brake performance may be degraded due to brake overheat; therefore, stop the vehicle frequently to cool down the brake.

- The vehicle can only be towed from the front side at a speed not more than 40 km/h (25 mph). The towing distance shall not be more than 25 km.
- If vehicle towing is needed due to brake failure, a platform trailer must be used to transport the complete vehicle.

### Vehicles Equipped with Automatic Transmission

- If the transmission has mechanical fault, the drive wheels must be off ground completely.
- If the towing speed is over 20 km/h or the towing distance is longer than 20 km, the drive wheels of the vehicle being towed shall be off ground completely.
- It is suggested that the drive wheel of vehicle being towed shall not be on ground. If the vehicle must be removed from a dangerous position, the speed shall not be over 20 km/h.
- Backward towing is prohibited.
- It is prohibited to tow the vehicle when the ambient temperature is below 0°C.

#### **CAUTION**

Check the level of automatic transmission fluid before towing. If the level is under the scale "HOT" on the dipstick, please add transmission fluid. If not, towing trolley must be used.

#### **Rescue of Trapped Vehicle**

To rescue a trapped vehicle, do not pull the vehicle violently or at a certain angle. Excessive traction may damage the vehicle.

If the drive wheel is trapped in soft or muddy road, the rescue vehicle shall be extremely careful, especially when it is with load.

Do not try to pull the vehicle out with a towing hook. Try to pull the vehicle backwards along the track left by the trapped vehicle if possible.

#### **VEHICLE ABNORMALITY**

For any of the following conditions, the vehicle may need adjustment or maintenance. Please contact a dealer authorized by Changan Automobile as soon as possible.

#### **Visible Abnormality**

- There is fluid leakage beneath the vehicle. (It is normal if the fluid is water from an operating A/C or drain hole of exhaust pipe.)
- The tire is flat or with uneven wearing.
- The pointer of engine coolant temperature gauge keeps indicating a suspiciously high temperature.

#### **Audible Abnormality**

- There is change of exhaust sound;
- The tire noise is too load when the vehicle makes a turn;
- There is suspicious noise related to the suspension system;
- There is noise related to the engine.

#### **Operation-related Abnormality**

- Engine pauses, runs unstably or with vibration;
- The power drops noticeably.
- The vehicle seriously runs off track when the brake is applied;
- The vehicle seriously runs off track on a flat road:
- The brake is out of order, or the brake pedal is soft to step on, or the pedal almost falls on the floor.

### **VII. MAINTENANCE AND REPAIR**

# PRECAUTIONS FOR MAINTENANCE AND REPAIR

When the vehicle is receiving new vehicle inspection and calibration or maintenance, the precautions below shall be followed to reduce the risk of personnel injury or vehicle damage.

- Do not operate when the engine is hot. Stop the engine and let it cool down.
- To work under the vehicle, use security support to hold the vehicle up. When the vehicle is lifted by a jack, do not go under of the vehicle.
- Keep combustibles and spark away from battery, gasoline and all parts related to gasoline.
- When the ignition switch is in ACC or ON position, it is prohibited to remove or install battery or other electrical elements.
- To connect the battery cables, be careful with the positive and negative poles, and do not mix them up.
- Battery, ignition cable and vehicle circuits are all with high current or high voltage. Operate with caution and do not cause short circuit.
- When the operating engine is inspected in an enclosed place (like a garage), please make sure that there is proper ventilation.
- Oil, coolant and other fluid shall be stored away from children and pets.
- Never apply silica gel (glass cement) on sunroof.

#### **DRIVER INSPECTION LIST**

#### **Routine Inspection**

Lamps

Check whether all driving lamps (headlamp, tail lamp, clearance lamp, turn signal lamp, brake lamp and fog lamp) are functioning right.

Warning lamps and indicator lamps

Check whether all instruments, control buttons and warning lamps are functioning right.

Rearview mirror

Make sure the reflecting surface of rearview mirror is clean, and the mirror can be adjusted freely.

Vehicle doors and engine hood

Check whether all vehicle doors and the engine hood can move smoothly and whether they can be locked firmly.

Vehicle body appearance

Check the vehicle body for paint peeling or scratch. Repair such damage if there is any, to prevent corrosion of metal of damaged positions.

#### Inspection at Refueling

- Check the engine oil level, brake fluid level and cleaning solution level.
- Check the tire pressure.
- Check the tire condition.

Check and make sure there is no crack on tire wall or tire surface, and there is no foreign matter in tire tread.

#### **Monthly Inspection**

- Engine coolant level
- Leakage of pipes, hoses and reservoir for leakage
- Operation of A/C system
- Operation of parking brake

Check whether the parking brake can be engaged and released.

- Operation of horn
- Fixing of wheel nuts

Nuts and bolts are tightened to specification.

Wipers

Inspect for good state of wiper arms and blades.

Steering system

Inspect whether the steering wheel is too loose.

#### Pedals

Check the brake pedal and the clutch pedal for appropriate travel.

#### Pneumatic rod

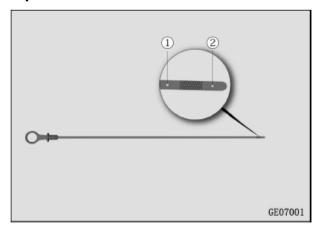
Check the supporting capacity of pneumatic rod, and check the rod for wearing, breakage and other sign of damage.

#### Sunroof

Check the sunroof bolt for looseness. Check the drain channel of the left and right interior guide rails for dust and foreign matter. Check the sunroof for smooth movement.

#### **ENGINE OIL**

#### **Dipstick**



#### **Oil Specification**

#### **CAUTION**

Do not use mixed lubricants of different designations.

Engine oil additives and other engine maintenance products are prohibited, as the engine may be damaged by such substance, affecting the validity of warranty.

Do not use engine oil which does not meet the specifications and requirements, as such oil may damage the engine, affecting the validity of warranty.

The engine is filled with oil of multiple viscosity grades when it is delivered. This kind of engine oil is suitable for all seasons except extreme climates.

Please use oil products approved by Changan Automobile. If such engine oil is not available in local market, 5W-30 engine oil with SN quality grade and above of API/ACEA specification shall be used. However, using such engine oil may result in long engine startup time, performance degradation, fuel efficiency reduction and increase of emission etc.

In extremely low temperature, please use engine oil of 0W-30 viscosity grade to guarantee the cold start performance of engine under such climate condition.

#### **Oil Inspection**

Check the oil level before start the engine, and make sure it is between MIN ((2)) and MAX ((1)) marks.

- 1. Park the vehicle on a flat road;
- 2. If the engine is running, stall the engine and wait for 5 min;
- 3. Remove the dipstick, and wipe it with clean and downless soft cloth.

Insert the dipstick into the engine and then take it out to check the oil level. If the oil level is below MIN mark, add oil.

#### **Filling**

Add oil only when the engine is in cold state. The oil level shall not be higher than MAX mark. It is suggested to add to the upper limit position of the stamp.

- 1. Remove the engine oil filler cap, and add engine oil through the filler slowly to the upper limit position of the dipstick stamp.
- 2. Wipe off spilled oil with absorbent cloth, and cover the engine oil filler cap.
- 3. Start the engine and keep it idling for 1 minute, and reinspect the oil dipstick 5 minutes after stopping the engine.

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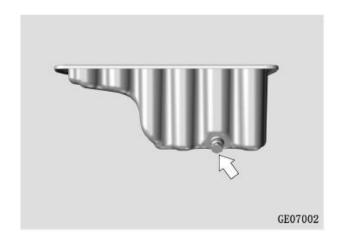
#### **DANGER**

It is prohibited to remove the engine oil filler cap while the engine is operating.

#### Oil Replacement

After the engine stops operating, drain the oil when it is still hot;

- 1. Remove the filler cap;
- 2. Place an oil collector under the drain plug;
- 3. Use a wrench to remove the drain plug and drain the oil;
- 4. After oil is drained out, reinstall the drain plug and tightened it to specified torque (55±5 N·m);
- 5. Add oil as per the standard.



#### A

#### **DANGER**

Oil is harmful to human body. Please keep it properly to prevent children from taking it by accident.

Please use neutral soapy solution to wash hand thoroughly after contact oil.

To replace oil, please always wear protective appliances to avoid skin exposure.

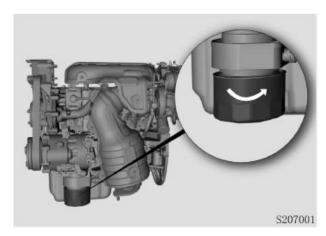
To replace oil, please always add qualified oil of correct quantity.

Use oil shall be collected properly.

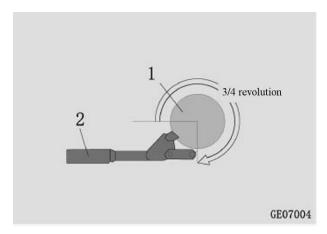
To remove the oil drain plug, make sure it is not hot anymore; otherwise it may cause scald due to oil overheat.

#### Replacement of Oil Filter

Oil filter can remove harmful particulate matters inside the engine, so as to guarantee that clean oil flows smoothly among the engine components, further to prevent engine components from damage.



- 1. Use special wrench to loosen oil filter counterclockwise and remove it:
- 2. Wipe the surface of oil filter mounting base. Check and calibrate the tightening torque (55±2N·m) of oil filter connecting pipe;
- 3. Apply engine oil around the rubber gasket of new filter. Tighten the oil filter by hand until the gasket contacts with the mounting surface;
- 4. Use special wrench to move a certain distance from the contact point as per the specified torque  $(20\pm2~N\cdot m)$ .



- 1: Oil filter
- 2: Wrench for oil filter

#### **CAUTION**

Tighten the oil filter properly to make sure that the oil filter sealing gasket contacts with the mounting surface.

Tighten the oil filter properly to prevent leakage.

If you cannot replace the filter by yourself, please go to a dealer authorized by Changan Automobile for maintenance.

#### **FUEL FILTER**

Blockage of fuel filter may impose restrictions on vehicle speed and damage the exhaust system, resulting in starting difficulty or other bad conditions. If there are too many foreign matters in the fuel tank, the fuel filter shall be replaced more frequently. The replacement and installation of fuel filter shall be carried out by a dealer authorized by Changan Automobile.

After a new fuel filter is installed, start the engine for a few minutes, and check the connections for leakage.

# REPLACEMENT OF ENGINE AIR FILTER ELEMENT



#### **WARNING**

It is forbidden to remove the air filter when the engine is running, and it is also forbidden to start the engine after the air filter is removed, so as to reduce the risk of vehicle damage and personal injury.

#### **Replacement of Air Filter Element**

- 1. Remove the screws, bolts and clips fixing the upper cover of air filter.
- 2. Carefully remove the upper cover of the air filter.
- 3. Remove the filter element from the housing.
- 4. Wipe the housing and outer cover of the air filter to remove the dirt or chips, and ensure tight sealing.
- 5. Install the new element. Please be cautious not to allow the edge of the element to roll up or fold up between the housing and outer cover of the air filter, as it may damage the air filter and allow the unfiltered air enters the engine due to incomplete sealing.
- 6. Install the upper cover of the air filter and tighten the screws, bolts and clips.

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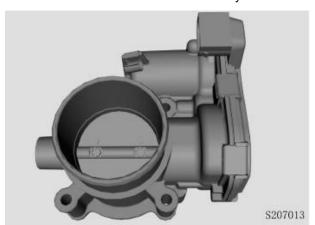
#### **DANGER**

- To remove the top cover of air filter, please take caution to prevent dust or dirt entering the top cover and the air pipe connected to the cover, as this may cause the engine damage.
- Improper use of air filter element may cause the serious engine damage.

## Clean Throttle Valve Body (Electronic Type)

#### Remove electronic throttle valve body.

- 1. Turn the ignition switch to OFF position.
- 2. Remove the connector of electronic throttle valve body.
- 3. Remove the air inlet guiding tube connected to the electronic throttle valve body.
- 4. Remove the connecting bolt of electronic throttle valve body and intake manifold, and check whether the sealing gasket (ring) is intact.
- 5. Remove electronic throttle valve body.



#### **Clean Electronic Throttle Valve Body**

- 1. Use carburetor cleaning agent to remove the grease and carbon deposition in the main channel.
- 2. Split the valve blocks of electronic throttle valve manually, and clean the part blocked by the block edge.
- 3. The dirt may harden after a long-time deposition (at the block end surface and the inner wall of opening opposite). If so, it will be hard to remove the dirt even with carburetor cleaning agent. Please use soft cloth to wipe it repeatedly to remove the dirt.
- 4. Let the cleaned electronic throttle valve body dry naturally, or blow it to dry, until the fluid in the main channel are all gone.

#### **CAUTION**

- It is forbidden to clean the electronic throttle valve body by immersing it in cleaning agent, or clean it with ultrasonic wave.
- Genuine carburetor cleaning agent must be used. Any cleaning substitute containing methyl ethyl ketone or other highly corrosive substance is forbidden, so is homemade cleaning agent.
- It is forbidden to rinse the bearing hole of the block. It is also forbidden to splash cleaning agent on the connector and the block bearing hole.
- As to grease and carbon deposition which are difficult to remove, dip soft cloth in the cleaning agent, and then use the cloth to wipe the part repeatedly. It is forbidden to scrape off the dirt with hard or sharp tool.
- Both the front and rear ends of the electronic throttle valve body must be cleaned carefully.
- Measures shall be taken to prevent water, oil or any other foreign matters entering the

connectors (on the device end and harness end) during washing.

#### **Assemble Electronic Throttle Body**

- 1. Make sure the sealing gasket (ring) of the intake manifold is intact. Assemble the electronic throttle valve body onto the intake manifold, and then tighten the bolts to specified torque (10±2 Nm).
- 2. Connect the air inlet guiding tube and tighten the clamp.
- 3. Connect the connector of the electronic throttle valve body, and fix the harness as per the original conditions.

### Self-learning of Electronic Throttle Valve Body

- 1. Turn the ignition switch to ON position, and wait for 60s.
- 2. Start the vehicle, and wait until a stable idling status is achieved, and then shut down the engine.
- 3. Turn the ignition switch to OFF position, and wait for 10s.
- 4. The self-learning is done now.

#### **CAUTION**

- During self-learning of electronic throttle valve body, make sure the engine water temperature and the air inlet temperature is not less than 5.25°C, and the battery voltage is not less than 10 V (sufficient to pass monitoring of diagnostic scanner).
- During self-learning of electronic throttle valve body, any other operation than the specified ones is forbidden.

# MAINTENANCE OF BOOSTER

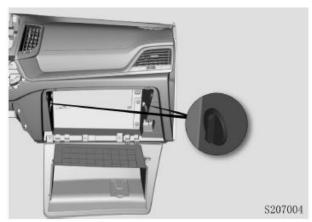
Please always replace the air filter element and oil filter in time, so as to avoid oil leakage or damage of booster.

Do not use engine oil which does not meet the specifications and requirements, so as to avoid damage to booster.

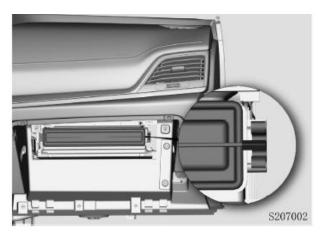
Do not remove or install the booster and relevant pipelines without permission, as the booster may be damaged if foreign matters enter the booster, resulting in insufficient performance, suspicious noise and oil leakage.

#### REPLACE AIR FILTER

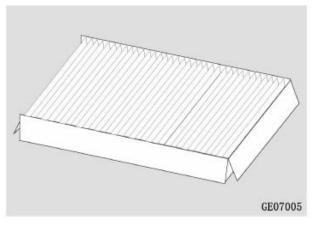
1. Open the glove box, and dismount the stopper on each side of the glove box to let the glove box hang freely on the hinge.



2. Hold the clip on the right side, open the cover plate of the A/C air filter, and then pull out the air filter element:



3. Replace the air filter element;



4. Install the element in reverse sequence of removal.

#### **ENGINE COOLANT**

When the engine is cold, the coolant level shall be between MIN and MAX marks. If the coolant level is below MIN mark, add coolant.



#### **Add Coolant**

#### **M** DANGER

It is only allowed to add coolant when the engine is cold. Do not take off the cap of the coolant reservoir when the engine is hot; otherwise the steam and water may escape upon the action of internal pressure, resulting in risk of scald.

#### **CAUTION**

The freezing point of the coolant used for the engine shall be 5°C lower than the lowest temperature of the relevant region and season. Hard water like tap water, river water and well

Hard water like tap water, river water and wel water shall not be used as coolant.

- 1. Remove the cap of the water reservoir. Add coolant through the filler of the water reservoir until the coolant level reaches MAC mark;
- 2. Put the cap back;
- 3. Start the engine. Turn off the air conditioner. The engine idles at a speed of 2,000 rpm, until the

water inlet pipe of radiator becomes hot;

4. When the engine cools down, add coolant again until the coolant level reaches MAX mark. Repeat the procedures until the coolant level in reservoir no longer drops, and then install the cap.

#### **WARNING**

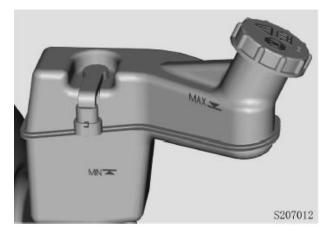
Operate with caution and do not have coolant contact with skin or eyes. If it happens accidentally, rinse the skin and eyes with plenty of clean water, and ask for medical help immediately.

It is forbidden to remove the cap of water reservoir while the engine is running.

Air may enter the cooling system due to improper operation, resulting in engine overheat. If so, please go to a dealer authorized by Changan Automobile for maintenance.

#### **BRAKE FLUID**

The brake fluid level may drop due to brake wearing. Check the fluid level regularly to make sure it is between MAX mark and MIN mark.



If the liquid level is low, please add brake fluid until the level reaches MAX.

If the indicator lamp for brake system fault on the instrument lights up, check the brake fluid level to see whether it is too low. If the fluid is low, the system performance may be affected. If the liquid level is suspiciously low, please go to a dealer authorized by Changan Automobile for maintenance as soon as possible.

#### **CAUTION**

The brake fluid used must be clean. Any contamination caused by dust, water, petroleum product or other materials may result in damage and even fault of brake system.

To replace or add brake fluid, the specified brake fluid must be used; otherwise the braking performance may be degraded.

Before remove the cap of the oil reservoir and add brake fluid, please thoroughly clean the area around the reservoir so as to prevent contaminant entering. Please do bleed the air in the brake line system upon completion of brake fluid adding each time.

#### **▲** WARNING

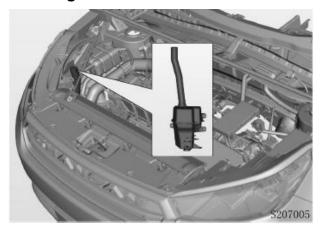
Operate with caution and do not have fluid contact with skin or eyes. If it happens, rinse the skin and eyes with plenty of clean water, and ask for medical help immediately.

To replace brake fluid, please always wear goggles.

If the brake fluid splashes on the painted surface, please rinse the surface with clean water immediately.

# WINDSHIELD CLEANING SOLUTION

### Inspection Fluid Level of Windshield Cleaning Solution



Check the fluid level of the windshield cleaning solution in reservoir regularly, and add the solution in time as necessary. Where the ambient temperature is below zero centigrade, please use anti-freezing windshield cleaning solution to prevent freeze.

Do not add tap water or coolant in the cleaning solution reservoir. Tap water may cause pipeline blockage. If cleaning solution splashes onto the windshield, it may affect the view of the driver and further lead to vehicle out of control. Besides, the splashed cleaning solution may damage the paint surface and the decorations on the vehicle body as well.

Please use qualified cleaning solution specified by the Company. Unqualified solution may cause motor damage, nozzle blockage and another fault. If the washing system does not function due to fault, please go to a dealer authorized by Changan Automobile for maintenance as soon as possible.

#### DANGER

- As the cleaning solution is flammable, keep the reservoir away from spark or fire.
  - Do not touch or drink cleaning solution.

# EXHAUST EMISSION CONTROL SYSTEM

#### **Precautions for Repair**

- Do not remove any part or connector of the electronic fuel injection system, so as to prevent water, oil and other foreign matter from entering the sealing silo of the connector, or causing other damage, which may affect normal function of the system.
- As the control unit is not designed for water proof, be careful to prevent water front entering ECU when the vehicle is inspected and repaired in rainy days or when the vehicle is washed.
- Do not install devices which can cause radio interference (e.g. radio antenna) near ECU.
- When carrying out operating-mode fault simulation and other maintenance operations which may cause temperature rise, please make sure the temperature of the area 1 cm away from ECU surface is not more than 105°C.
- Before welding on the automobile, please remove ECU first.
- Do not remove the fuel pipe if it is not necessary. High-pressure gasoline remains in the line even the engine is not running. Removal and

replacement of fuel pipes, as well as replacement of fuel filter must be carried out by professionals at a well-ventilated place.

- Before remove the pipe, relief the pressure first in the following way: Remove the fuel pump relay. Start the engine and let it idle until the engine stalls automatically. To remove the fuel pipe, cover the pipe joint with a clean towel to absorb the leaked fuel, so as to reduce the fire risk.
- To loosen the connection of fuel pipe, clean the connecting position and the surrounding area thoroughly. Place the removed parts on clean pad and cover them properly. Do not use fibrous rag. If the repair will not be performed immediately, seal the opening part.
- It is not allowed to disconnect the battery cable when the engine is running.
- To connect the battery cable, be careful to ensure that the positive and negative poles are connected correctly; otherwise it may cause damage to electronic elements.
- When taking the electronic fuel pump out of the fuel tank, please be careful not to electrify the fuel pump, as it is possible to generate spark.
- Be careful to ensure that positive and negative poles of the fuel pump power supply are connected correctly.
- Pull out the fuel injector connector before measuring compression pressure of the cylinder.
- It is strictly prohibited to remove any connecting wire or connector when the engine is running. It is strictly prohibited to test the electric signal by piercing the wire sheath.

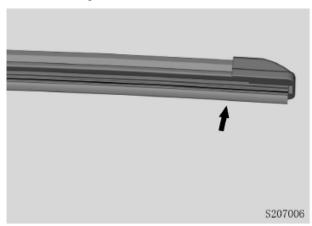
#### **Wiper Blade**

#### **CAUTION**

- If there are noticeable foreign matters on the windshield or wiper blade, remove the foreign matters before using the wiper, so as to avoid damaging rubber strip of wiper blade.
- In winter, before turn on the wiper, remove all snow and ice on the windshield and wipers first.
- Never use gasoline, petroleum, paint thinner or other similar solvent to clean the wiper blade.
- In order not to damage the wiper arm or other components, please do not pull or rotate the wiper arm or the wiper blade with hands.

#### **Inspect Wiper Blade**

Slide your fingertip along the edge of wiper blade to check the roughness.



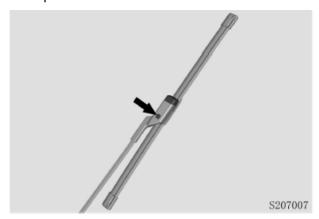
If the wiper blade is not properly clean, use wet soft sponge to clean the wiper blade. Firstly, use special cleaning agent to wash the windshield and the wiper blade, and then rinse them with clean water.

If the windshield cannot be thoroughly cleaned after

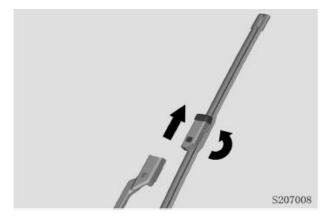
the wiper and glass have been cleaned, the wiper blades shall be replaced immediately.

#### Replace Wiper Blade

1. Place the wiper arm upright, and press and hold the connector button between the wiper brush and the wiper arm.



2. Rotate the brush to a certain angle, and then remove the wiper blade along the direction shown below.



3. Install in the reverse order of removal.

### Common Knowledge of Wiper Maintenance

If the wiper has not been used for a long time, and the wiper blade has been deformed due to stress, it is normal that the wiper shakes, makes suspicious noise or cannot wipe clean in the first several operation cycles, and these faults will disappear after continuous wiping.

If the vehicle is parked for a long time, it is suggested to lift the wiper arms up before driving, to make the wiper blades return to the original state (in which the wiper blade almost vertical to the windshield). It is to reduce the possibility of rubber strip deformation.

#### **Common Faults of Wiper Blade**

Common Fault	Diagram	Description	Possible Causes
Arc-shaped thin stripes		There are thin and long arc shaped stripes which affect view.	Foreign matters on the rubber strip of the wiper blade     Damaged cutting edge of the rubber strip
Vertical stripes		The wiper blade makes suspicious noise and shakes, and the rubber strip cannot move smoothly.	Oil or wax on the windshield     Deformed rubber strip of the wiper blade
Spots		There are spot-shaped water stains after the wiper wipes off water.	Deformed rubber strip of the wiper blade
Strip-like or belt-like area		The rubber strip does not fit closely to the glass surface, and it cannot wipe evenly.	Deformed rubber strip of the wiper blade     Deformed wiper blade frame, leading to insufficient pressure

Note: In case of afore mentioned faults, deal with them based on the "Inspection of Wiper Blade" section; if the fault cannot be removed, please go to a dealer authorized by Changan Automobile for maintenance.

#### **BATTERY**

#### **Self-discharge of Battery**

Theoretically, self-discharge of the battery is inevitable. Even though it is left in open circuit for more than 2 months, it still drains significantly. Self-discharge of battery is affected by temperature and storage environment.

- The self-discharge rate increases as the temperature rises.
- Dusty environment with high humidity will quicken self-discharge of battery.

### Methods to Reduce Self Discharge of Battery

- Keep the connection of the positive pole and the negative pole of the battery shall tight and firm.
- Keep the battery surface clean.
- If the vehicle will not be used for a long time, take off the battery and store it in a dry environment under moderate temperature.
- When the engine is shutdown, try not to use the on-board electric appliances for too long.

#### **Power Loss of Battery**

Power loss of battery is mainly caused by the following matters:

- Electric appliances on the vehicle continuously consume power (like the immobilizer).
- Poor insulating property of elements on the vehicle causes electric leakage.
- The negative connecting wire is not pulled off which causes quiescent current and leakage current, accumulating the amount of electricity that is lost.
- Electric appliances in the vehicle are opened when the engine has not been started.

#### **Battery Power Inspection**

- For battery with status indicator, it is possible to tell the battery condition based on the color (see the label of the battery) of the status indicator.
- Check with the voltmeter by using the headlamp as the load: Connect the voltmeter to the battery, and read the voltage value. Then turn on the headlamp. If the voltage of the battery does not drop quickly and remains above 10 V, the vehicle can be started after the battery is charged with the vehicle idling. If the battery voltage drops quickly after the headlamp is turned on, charge the battery.

Procedures of Battery Replacement

To remove the battery, disconnect the negative connecting wire first, and then the positive connecting wire.

To install the battery, connect the positive connecting wire first, and then the negative connecting wire. Please use an M10 socket or wrench to tighten them.

#### **TIRE AND WHEEL**

#### Tire Maintenance

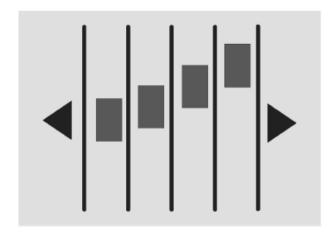
When the vehicle is running, try not to hit or squeeze big obstacles (like pit or road shoulder).

It is strictly forbidden to scratch the side wall of tire.

Check the tire tread regularly for cutting, foreign matter and uneven wearing. Uneven wearing of tread may indicate deviation of wheel alignment.

Remove the foreign matters stuck in the tread pattern regularly.

Check the tire wearing identification on a monthly basis. If the tread wearing is flush to the tire wearing identification, it indicates that the tire shall be replaced.



Please replace the tire immediately upon discovery of such irregular wearing, bump, upheaval or other damage on the tread pattern or on the lateral side of the tire.

Check the tire pressure (including pressure of spare tire) at least once a month to achieve the best fuel efficiency. The difference between the tire pressure values of the left and right tires shall not be more than 5 kPa.

Check the tire pressure in time as the condition changes.

Any tire that has been used for more than 6 years shall be replaced even though it has no noticeable damage.

#### DANGER

- Using tires with excessive wearing is very dangerous as it may reduce brake performance, turning accuracy and traction.
- Use only tires and wheels of the same dimensions and types as the original ones; otherwise the safety and operational performance

of the vehicle will be affected, which will further lead to accidents or even serious injuries.

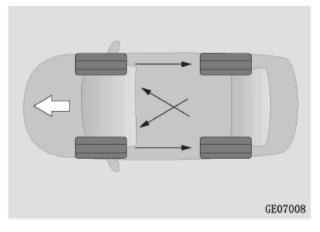
#### **Method of Tire Pressure Inspection**

- 1. Remove the valve cover of the valve core on the tire.
- 2. Measure the tire pressure with the tire pressure gauge. In cold condition, if the tire pressure does not comply with the recommended value, please adjust it.
- 3. Check the tire pressure. If the tire is over inflated, press the valve core in the valve on the tire to lower the pressure.
- 4. Check the tire pressure again. If the pressure meets the requirement, install the valve cover on the valve to prevent dust and moisture from entering and causing tire leakage.

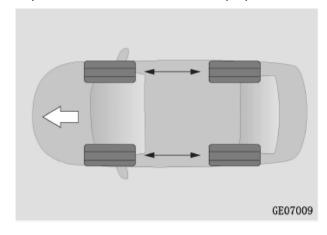
#### **Position Exchange of Tire**

To guarantee even wearing of the front and rear tires and to extend the service life of tires, it is suggested to change the position of tires after every 10,000 km. See the figure below for the rules of position exchange. In case of any irregular wearing, please change the tire position earlier.

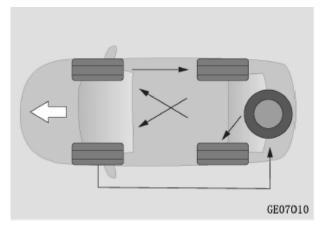
A: no spare tire



B: provided with tire for determined purposed



C: The spare tire is the same as the tire in driving



To exchange the tire position, please check the wearing condition of the lining on the disc brake. After position exchange, please ensure that the pressure of the front and rear tires, as well as the tightening force of the wheel nuts comply to the specifications.

Tires equipped with TPMS shall be sent to a dealer authorized by Changan Automobile for calibration after position exchange.

#### **Use of Winter Tire and Tire Chain**

It is suggested to use winter tire or tire chain when the vehicle is running on road covered with ice and snow.

Winter tire can significantly improve the operation stability of the vehicle running on road covered with ice and snow. It is suggested to use winter tires when the ambient temperature is lower than +7°C.

The winter tires to be used shall be the same as the original ones in respect of model, structure and carrying capacity, and the allowable operating speed and pressure of the winter tire must meet the tire distributor's requirement; otherwise the safety and operational performance of the vehicle will be affected, resulting in risk of accident or even serious injury.

The removed tire shall be marked with the rotating direction and kept in a cool and dry place. To use the removed tire again, install it along the original rotating direction.

When the ambient temperature rises above 7°C, replace the winter tire with summer tire or all-weather tire.

The thickness of tire chain shall not be more than 9 mm. For FWD vehicle, tire chain shall be installed on the front wheel. AWD vehicle shall be installed with tire chain on both the front and rear wheels.

When the vehicle has been running for 0.5~1 km, re-tighten the chains to ensure safety.

If the vehicle is installed with tire chains, try not to drive on bumpy road, or take any emergency measures (like rapid acceleration or emergency brake).

After returning back on normal road/barrier-free road, please take off the anti-skid chains.

For other matters, please follow the instructions provided by the chain supplier.



#### WARNING

Please always use suitable tire chain. Improper size or installation of tire chain will damage the brake line, suspension, vehicle body and wheel, and such damages are not covered by the warranty.

If the vehicle is provided with trim cover for wheel, please remove the trim cover before install the tire

chain.

Although all-weather tire with M+S marks has better winter performance than summer tire, it cannot satisfy the requirements for winter use in general cases.

#### A

#### **DANGER**

To avoid significant difference between road holding capacities of the wheels, which may result in vehicle being out of control, all wheels shall be installed with winter tires.

When the vehicle is running with winter tires, the vehicle speed shall not be more than the maximum allowable speed of the winter tire; otherwise the vehicle may suffer sudden pressure loss, damage or even flat tire, leading to traffic accident easily!

When metal tire chains are installed, the vehicle speed shall not exceed 30 km/h or the limit speed specified by the tire chain manufacturer, whichever is lower.

When non-metal tire chains are installed, the vehicle speed shall not exceed 50 km/h or the limit speed specified by the tire chain manufacturer, whichever is lower.

Always adjust the vehicle speed based on the weather, road and traffic conditions. Do not risk with the slip resistance of the winter tire for fear of accident!

#### Replacement of Wheel

If the wheel is bent, cracked or badly corroded, replace it immediately as the tire may separate from the wheel.

#### **Choosing Wheel**

Where it is necessary to replace the metal wheels,

please ensure that the new wheel has the same specifications as the original ones.

Changan Automobile does not recommend the following wheels:

- Wheels of different sizes or types
- Used wheels
- Bent wheels that have been corrected

### Requirement for Dynamic Balance of Wheels

To install a new tire, please be sure that dynamic balance calibration of wheels has been completed. To remove the tire from a wheel, the balance calibration is required too.

The total number of hanging balance blocks at a single side shall be not more than two, weighing a total not more than 60 g; the total weight of sticking balance blocks at a single side shall not exceed 100 g. After the wheel and tire are assembled, the residual dynamic unbalance at a single side shall not exceed 5 g.

To install a tire for determined purpose, please ensure that the rotating direction of the tire is the same as that marked on the tire.

#### **Precautions for Aluminum Wheels**

- Please do use the special Changan wheel nuts and wrench for the aluminum wheel.
- With the wheel reinstalled upon removal, or replaced, please check and confirm that the wheel nuts are tight after the vehicle has run for 1,600 km.

• When tire chain is used, please be careful not to damage the aluminum wheels.

#### **FUSE**

The layout of fuses and relays is drawn on the upper cover of fuse box and on the back of the access cover of instrument fuse box.

#### Main Fuse Box in Engine Room

It is located beside the engine battery.

### Auxiliary Fuse Box of Engine Compartment

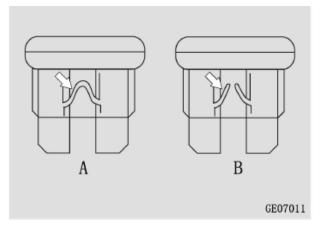
It is located beside the left headlamp of engine.

#### **Fuse Box of Instrument**

It is located inside the instrument panel at the driver's side, behind the bill box.

#### **Fuse Replacement**

- 1. Remove the cover of fuse box or the access cover of instrument fuse box.
- 2. Check the fuse box for intactness to see whether it is broken.



A: normal fuse B: blown fuse

#### **WARNING**

To replace the fuse, turn off the ignition switch and all electrical appliances first.

The new fuse shall be with the same specifications as the original one; otherwise the electrical appliance may be damaged.

If the new fuse is blown again right after it is installed, turn off all electric appliances and go to a dealer authorized by Changan Automobile for maintenance.

To guarantee extended functions added by owner, even though there are certain fuses having not specific function inside the vehicle system, they shall not be removed for replacement.

## CLEANING OF VEHICLE BODY

#### **Cleaning of Appearance**

Wash the vehicle immediately in the following conditions:

- There is heavy dust or mud deposition on the vehicle:
- The vehicle has run along the sea or on saline-alkali road:
- The vehicle has run in an area contaminated by soot, lampblack, mine dust, iron powder or chemical substances:
- The paint surface of vehicle is attached with coal tar, sap, dead insect or faculae;
- When liquid like benzene and gasoline splashes on the paint surface of vehicle, do not have the nozzle of hydraulic giant face right in front of the crevice of the door, window or sunroof when wash the vehicle with high pressure water.

Make sure the sunroof is closed before sunroof cleaning. Never have the hydraulic giant face to the sealing strip of sunroof glass. In the season with intensive sunlight, wipe and wash the glass surface with soft cloth and non-adhesive cleaning agent in a cool place; in rainy season, be extremely careful with sand and dust on the sealing strip of sunroof glass, and wipe them off if any.

Do not rinse the vehicle with hydraulic giant within the range 40 cm away from the vehicle surface; otherwise the paint and stickers may be damaged or peel off.

The cleaning agent used for vehicle washing shall

be neutral. Please refer to the precautions and instructions of the manufacturer.

To wash the inner side of the rear window, use a piece of moist soft cloth to wipe the window gently along the direction parallel to the heating wire or antenna. Be careful not to bruise or damage the heating wire or the antenna.

Open the sunroof after wash the vehicle in winter. Wipe the sealing strip of sunroof glass with a piece of dry soft cloth.

To wax the vehicle, remove the wax on the windshield glass first.

#### **CAUTION**

- It is forbidden to wash or wax the vehicle with the engine running.
- To use the vehicle washing equipment, please be sure that the equipment is applicable to the vehicle.
- To wash the vehicle, check and make sure that the fuel filler cap is installed properly.
- Be careful not to use vapor or water with a temperature higher than 80°C to rinse the plastic components.
- Never use cleaning agent to wash the inner surface of glass, which is installed with defroster heating wire or antenna.
- Never use corrosive cleaning agent to wash the glass surface.
- To wash the sunroof, never use detergent, fuel, aggressive agent, acidic or strongly basic chemical agent, or scouring pad.
- Grease used for sunroof sealing: Dupont XP1A6; Grease for guide rail: NACO Dowsyn2602

# MAINTENANCE OF VEHICLE PAINT

- Try not to contact with strong acid or strong base.
- Please use special wiping cloth for cleaning.
   Try not to have the paint surface contact with any hard object.
- Try not to contact with volatile matters like gasoline and engine oil. In case of any contact with a small amount of such volatile matter, wipe it off immediately with special wiping cloth.
- Conduct professional maintenance regularly to protect the paint film on the vehicle. It is recommended to apply wax and polishing agent to the vehicle once or twice a year.

If there is any scratch on the paint, please clean and dry the damaged surface. Use 1500# abrasive paper to grind the surface, and then polish it with wool bulb. If the damaged surface cannot be repaired that way, please go to a dealer authorized by Changan Automobile or a professional repair factory for repair.

# MAINTENANCE OF VEHICLE BODY ACCESSORIES

It is suggested to lubricate the sealing strips of doors and windows at least once a year. Use a clean rag to apply silicone oil on the rubber sealing strip, to improve the durability and sealing performance of the strip. Lubricating can also avoid strip adhesion and squeak.

For long time storage, spray silicone lubricant on the door and at seals of trunk, and apply body wax on the painted surface contacting sealing strip to avoid adhesion.

Lubricate the door hinges and latches, as well as the hinge and latch of engine hood regularly.

#### **CORROSION PROTECTION**

#### Cause of Vehicle Corrosion

Causes of vehicle corrosion are:

- Salt, dirt, moisture and chemical substance have accumulated for a long period on such hardly accessible positions as the chassis, the vehicle body and the vehicle frame.
- Paint peeling, bruise or other damage can be caused by accident, as well as the friction of stone and sand.
- High humidity may accelerate corrosion. If certain part of the vehicle is exposed to a high-humidity environment for a long time, it may also result in vehicle corrosion even though the other parts are dry. In a high-humidity environment, if certain part of the vehicle cannot be dried quickly due to poor ventilation, it will also accelerate the corrosion.

### Effective Prevention Against Vehicle Corrosion

Always keep the vehicle clean and dry.

At the same time of vehicle maintenance, check and use warm or cold water to wash the drain holes on the underbody, and make sure the holes are unblocked and in good ventilation.

If the paint coating of vehicle surface is damaged or peels off, repair the damage immediately and do not have the metal base exposed to air.

Check the inside of vehicle frequently to make sure it is clean and dry. Moisture, dust and silt under the cushions can also accelerate the corrosion.

To deliver corrosive loads (such as acid, alkali, salt and fertilizer), always use special containers for such loads, and wash the vehicle immediately after unloading.

Wash the vehicle immediately after the vehicle has run on a salted road in winter.

Do not park the vehicle in damp places without proper ventilation. Do not wash the vehicle in the garage.

#### **CLEANING INSIDE VEHICLE**

#### **Cleaning of Plastic Parts**

Use moist cotton rag and neutral non-abrasive water solution to clean the plastic parts inside the vehicle, so as to avoid water stain, water mark or permanent spot.

To remove oil stain or stubborn stain, solvent-free special product which may remain the original surface and color of the component can be adopted. It is not suggested to wipe the surface with tissue

for fear of residual.

#### **Cleaning of Seat Belt**

Dip a piece of soft sponge in neutral soap solution or warm water, and then use the sponge to clean the seat belt; do not use decolorizer, coloring agent or abrasive cleaning agent; after cleaning, have the belt dry by air or use cloth (sponge) to scrub the seat belt; do not allow it to be exposed directly in sunlight.

#### **Cleaning of Seat**

For seat with leather coating, clean the seat coating carefully with moist rag, and then wipe the coating with dry cloth. Do not wet any part of the leather coating; otherwise it may become rough or crack.

Use moist microfiber cleaning cloth dipped with cleaning agent (like detergent) to clean the seat sleeve. Clean the sleeve carefully and do not leave any visible mark. Have the seat dry.

Do not use paint diluent, benzene, ethyl alcohol or gasoline to clean the seat; otherwise the seat surface or the heater (if equipped) will be damaged.

#### **Cleaning of Display**

To clean the display, make sure the display has been turned off and cooled down.

Use microfiber cleaning cloth and TFT/LCD display cleaning agent to clean the display surface.

Wipe the display surface with dry microfiber cleaning cloth.

#### **WARNING**

It is forbidden to wash the display with ethyl alcohol diluent or gasoline, soaking type cleaning agent or domestic cleaning agent.

# FOG/FROST FORMATION ON LAMPS

The breathing holes are used to adjust the internal pressure when the external lamps are working. When moist air comes into the lamps while the lamp glass is kind of cold, there may be fog (or even frost if it is extremely cold). It is normal and has no adverse effect on normal operation and illumination of the lamps.

There will be dew on the internal surface of the lamp glass as a result of fog formation. The dew will be gone eventually, but it may come back later in the following use. It may take 2 or 3 days, or even longer for the fog to disappear, depending on the ambient temperature, humidity and the working time of the lamp.

## Inspection for Fog/Frost Formation on Lamps

Start the engine, turn on the high beam lamp and perform the following visual inspections after 30-40 minutes:

- 1) There is no water inside the lamp.
- 2) There is no visible fog from a distance of 1 m.

If so, the headlamp is in normal condition.

#### **Luminance of Headlamp**

The headlamp luminance of motor vehicles is clearly specified in the national laws and regulations. The headlamp luminance of all vehicles shall neither be too bright nor too dim; otherwise, accidents may occur.

As the vehicle is designed as right-handed, to avoid endangering the view and safety of the vehicle coming from opposite direction, the light of the left low beam lamp is designed to be lower than that of the right one.

If luminance of the headlamp is deemed as not bright enough, please go to a dealer authorized by Changan Automobile for consultation and inspection.

#### **GPF MAINTENANCE**

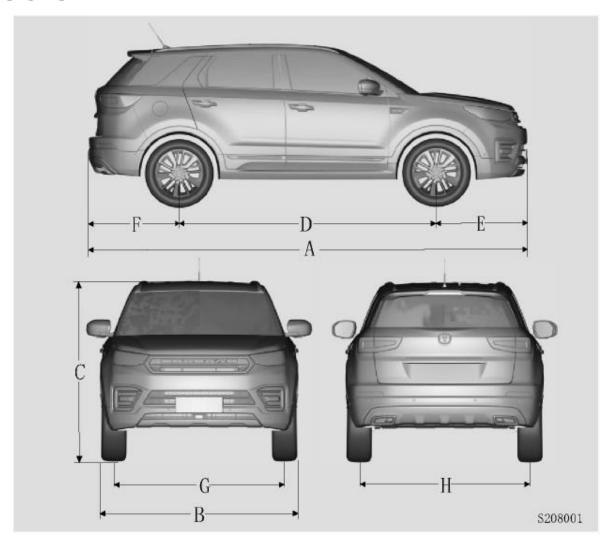
When GPF maintenance is displayed on the instrument, the owner can select the following two ways according to the actual situation:

- 1. Please go to the nearest Changan Automobile authorized service online store for maintenance as soon as possible. (recommended)
- 2. Under the condition of ensuring driving safety, it shall be handled according to special working conditions.

When the GPF maintenance words on the instrument disappear, the vehicle can drive normally.

### **VIII. SPECIFICATIONS AND PARAMETERS**

### **VEHICLE DIMENSIONS**



### **CS55**

Item	Dimension Description/mm	SC7155AA6/SC7155AAH6/SC7155AAAH6/SC7155ABH6 /SC7155ABAH6/SC7155AABH6/SC7155ABBH6
Α	Total length	4500
В	Total width (without rearview mirror)	1855
С	Total height (no load)	1690
D	Wheel base	2650
Е	Front suspension	925
F	Rear suspension	925
G	Front wheel track	1590
Н	Rear wheel track	1595

Parts not included in overall dimensions: exterior rearview mirror, door handle, flexible section of antenna

### **ENGINE**

Engine Mode Item	JL476ZQCD	
Number of cylinders	4	
Bore × piston travel (mm)	76x82.6	
Spark plug gap (mm)	0.7-0.8	
Mounting torque of spark plug (N⋅m)	22.5±2.5	
Displacement (ml)	1499	
Compression ratio	9.5:1	
Rated power (kW)/revolving speed (r/min)	115 kW (5500 r/min)	
Maximum net power(kW)/revolving speed (r/min)	105 kW (5500 r/min)	
Maximum torque (N·m)/speed (r/min)	225 (N·m) (2000~4000 r/min)	
Idle speed (r/min)	720±50	
Ignition order	1-3-4-2	

## **CS55**

### **VEHICLE PERFORMANCE**

	Model	SC7155 AA6	SC7155 AAH6	SC7155 ABH6	SC7155 AAA6	SC7155 AAAH6	SC7155 ABAH6	
Item								
	Approach angle ≥ (°)	21						
	Departure angle ≥ (°)	25						
Trafficability	Minimum ground clearance (no load) (mm)	190						
	Minimum turning diameter (m)	11.2						
Dynamic performance	Maximum vehicle speed (km/h)	180						
periormance	Maximum gradeability	30%						
Economic efficiency*	Fuel consumption based on working condition (comprehensive) (L/100km)	7.1 6.9 7.4 7.0 6.7 6.8				6.8		
Tru	Trunk capacity/L		505-1415					
Brake pedal free travel		5-10 mm						
Reasonable serviceable range of brake lining		9 mm for front, 7.8 mm for rear						
Driving type		Front wheel drive						

Note: The actual fuel consumption may differ from \* value due to the different actual service conditions.

#### WHEEL & TIRE SPECIFICATIONS AND INFLATION PRESSURE AT COLD STATE

	Tire Specifications	Tire Pressure (kPa)				
Rim Specifications		No load		Full load		
		Front	Rear	Front	Rear	
17x7J	225/60R17*	230	230	230	230	
18x7J	225/55R18	240	240	240	240	
17x4T	T125/80R17	420	420	420	420	

<sup>\*</sup> It is only allowed to install tire chain on specified tire.

### WHEEL ALIGNMENT (NO LOAD)

Item		Value	
	Kingpin inclination angle	12.58°±0.75°	
Parameter for front wheel	Kingpin caster angle	4.35°±0.75°	
alignment	Front wheel camber angle	-0.5°±0.5°	
	Toe-in angle	0°±0.1°	
Rear wheel alignment	Front wheel camber angle	-1°±0.5°	
parameters	Toe-in angle	0°±0.1°	

## **CS55**

### **VEHICLE MASS**

	Model	SC7155AA6/	SC7155AAH6/	SC7155ABH6/
Item		SC7155AAA6	SC7155AAAH6	SC7155ABAH6
Maximum allowable total mass (full load)/kg		1835	1865	1865, 1895
Axle load with maximum	Front axle	983	982	985, 998
allowable total mass/kg	Rear axle	852	883	880, 897
Curb weight/kg		1460	1490	1490, 1520
Aylo lood with ourh woight/kg	Front axle	864	870	872, 887
Axle load with curb weight/kg	Rear axle	596	620	618, 633

### **VEHICLE FUEL, OIL AND FLUID**

Item	Specification	Rated capacity
Fuel	Only for Saudi Arabia region, unleaded gasoline with an octane rating of RON (Research Octane Number) 91# /AKI (Anti Knock) 89# or above must be used for the model.  For other regions. unleaded gasoline with an octane rating of RON (Research Octane Number) 92# / AKI (Anti Knock) 89# or above must be used for the model.  Only gasoline of the specified designation enables your new vehicle with the best performance and minimizes exhausted gas quantity and carbon deposit in spark plug.	
Engine oil (JL476ZQCD)	SN/GF-5 5W-30	2.8±0.2L
Fuel detergent	GFSC001	150 ml/bottle/time
Manual transmission fluid	Castrol BOT130M GL-475W/90	2.0±0.1 L
Automatic transmission fluid	smission fluid AW-1	
Engine coolant	BASF Glysantin G30	6.2±0.2
Lubricating oil for A/C system	SP10	120 ml
Refrigerant for A/C system	R134a	500 g
Windshield cleaning solution	Windshield cleaning solution  ZT-30(Normal temperature area: freezing point of cleaning fluid shall be below - 20°C;  Low temperature area: freezing point of cleaning fluid shall be below -45°C.)	
Brake fluid	HZY4/DOT 4	1 L

## **CS55**

### **LIST OF ABBREVIATIONS**

Abbreviations	Meaning	Abbreviations	Meaning
ABS	Antilock Brake System	DVD	Digital Versatile Disc
TCS	Traction Control System	USB	Universal Serial Bus
ESC	Electronic Stability Control System	ECU	Electronic Control Unit
EPB	Electrical Parking Brake	LCD	Liquid Crystal Display
AUTO HOLD	Automatic Parking Function	LED	Light Emitting Diode
HHC	Hill Hold Control	СО	Carbon Monoxide
EPS	Electric Power Steering	VIN	Vehicle Identification Number
TPMS	Tire Pressure Monitoring System	SBR	Seat Belt Reminder
DAA	Drive Away Assist	APA	Automatic Parking Assist
EBD	Electronic Brakeforce Distribution	LDW	Lane Departure Warning
ALR	Automatically Locking Retractor	TSR	The Speed Limit Sign Recognition
SRS	Supplemental Restraint System	HDC	Hill Decent Control
DAB	Driver Airbag	TSP	Telematics Service Provider
PAB	Passenger Airbag	POI	Point of Interest
SAB	Side Airbag	ACC	Adaptive Cruise Control
CAB	Curtain Airbag	LAS	Lane Assistant System
AT	Automatic Transmission	HTR	High Temperature Reclamp
MT	Manual Transmission	DBF	Dynamic Break Function
IMT	Intelligent Manual Transmission	HPS	Hydraulic Power Steering
CD	Compact Disc	TFT	Thin Film Transistor

# WI.REGULAR MAINTENANCE

# TERMS AND CONDITIONS OF MAINTENANCE

For the detail of Maintenance Period and Mileage, please consult with your CHANGAN dealer.

#### WARRANTY EXCLUSIONS

CHANGAN does not accept liability for the cost of repair or the replacement of components for:

- 1. The vehicle has not been serviced and maintained according to the specifications as set out in this booklet.
- 2. Discoloration, air hole, crack, indention, rust and aging of inner trims, outer trims, painting of panels and rubber products arising from improper storage.
- 3. Parts or components that maintenance period or mileage expired.
- 4. Damage due to irresistible calamities (such as flood, fire and landslide, etc.).
- 5. Damage due to traffic accidents.
- 6. Damage due to customer's handling against the explanation of the vehicle or improper storage.
- 7. Damage caused by unauthorized vehicle modification cycle racing cycle racing or using of non-genuine parts.

- 8. Caused by incorrect fuels, incorrect oil or incorrect lubricants as set out in this booklet), negligence, accident, unreasonable use or abuse, including any competition, improper servicing or malicious damage or damage caused by cleaning materials.
- 9. Caused by the regular expendable and easily damaged parts beyond the warranty period indicated by CHANGAN;
- 10. Should the odometer not be working, or in the opinion of The Administrators, have been tampered with, altered, disconnected or replaced without the approval of The Administrators.
- 11. Arising out of any consequential loss of whatsoever nature, including failure of or damage to any component or part caused by the failure of a non-covered part.
- 12. Caused by civil commotion, labor disturbances, strikes, war, mutiny, insurrection, rebellion or revolution.
- 13. Directly or indirectly caused by ionizing radiation or contamination by nuclear waste or combustion of nuclear fuel.
- 14. The owner must take all reasonable precautions to prevent loss, damage or breakdowns and in the event of a breakdown or an impending breakdown, use all reasonable means to protect the vehicle from further loss or damage
- 15. Personal feeling problems that do not

affect performance in accordance with national laws, regulations and relevant regulations.

- 16. Vehicle tools : Triangle reflector \*\* (If equipped), Jack, wheel nut wrench, Jack rocker and tool kit.
- 17. Normal loss of lubricating oil, grease, brake fluid, coolant, cleaning fluid and refrigerant.

#### OWNERS' RESPONSIBILITY

The owner must service and maintain the vehicle according to the specifications of CHANGAN. All repair work requested by the owner must be signed for by himself or an authorized signatory. When collecting the vehicle, the owner must ensure that all specified on the repair order has been carried out to his satisfaction. Should the odometer become inoperative, or there is evidence of a problem arising on the vehicle, the owner shall immediately return the vehicle to a CHANGAN service station to have the necessary repairs carried out.

#### CLAIMS PROCEDURE

In the event of a mechanical or electrical failure, the vehicle must be returned to the dealer. Should this not be possible, the vehicle must be taken to the nearest CHANGAN authorized service station.

The owner must provide the following information to the dealer:

- -Owner's information
- -Vehicle Registration number
- -VIN
- -Date of purchase
- -Mileage
- -Description of Malfunction

The dealer will contact The Warranty Claims Office for authorization to proceed with the repair.

#### **CANCELLATION OF WARRANTY**

This warranty shall become null and void should the owner fail to service the vehicle according to the recommended specifications of CHANGAN. Any claims resulting from failure to service the vehicle, the owner should be charge with the result.

#### **WARRANTY TRANSFER**

The warranty that attaches to the vehicle is transferable to the subsequent owner of the

vehicle upon written request and confirmation by The Administrators. Please note that the details information of the new owner together with a copy of the repair record. Upon receipt and verification, The Administrators will advise the new owner of the warranty transfer. It is not possible to transfer the warranty from one vehicle to another.

#### SERVICE REQUIREMENTS

The vehicle must be maintained in accordance with CHANGAN's maintenance specifications. The warranty will become null and void if the vehicle is not maintained according to the specifications. The service record must also be accurately maintained.

The vehicle owner must also ensure that:

- Fluid levels are checked regularly.
- All lights and instruments are working correctly.
- Tyre pressures are correct relative to the load being carried.
- Fuel consumption is in line with manufacturers specifications.
- The engine is adequately warmed up in cold conditions.

# REGULAR MAINTENANCE SCHEDULE

#### The term and item of regular maintenance

The following two charts take running km or months as the standard to determine the time of maintenance. Each inspection, adjustment, lubrication and other maintenance should be performed strictly according to the time specified in the charts.

### **Chart Symbols**

- I: Inspect and if necessary, adjust, correct, clean or replace. R: Replace or change.
- \*1: Adjust alternator and power steering (and water pump drive belt) and air conditioner drive belt (if equipped).

Inspect and if necessary correct or replace.

\*2: Check the engine oil level and leak every 500 km or before starting a long trip.

# **CS55**

# NORMAL MAINTENANCE SCHEDULE

MAINTENANCE INTREVALS	Number of months or driving distance, whichever comes first													
	Months	3	9	15	21	27	33	39	45	51	57	63	69	75
MAINTENANCE ITEMS	km×1,000	5	15	25	35	45	55	65	75	85	95	105	115	125
POWER TRAIN														
Timing belt (if equipped)		Replace every 80,000 km~100,000 km												
Drive belts*1			ı	- 1	I	- 1	I	- 1	I	- 1	I	- 1	- 1	- 1
Engine oil and engine oil filter *2		R	R	R	R	R	R	R	R	R	R	R	R	R
Engine coolant		I	ı	R	I	R	I	R	ı	R	I	R	-	R
Manual transmission fluid (if equipped)						Replac	e every	60,000	km or	3 years				
Automatic transmission fluid (if equipped)	Replace every 60,000 km or 3 years													
Dual clutch transmission fluid (if equipped)		Replace every 60,000 km or 3 years												
Cooling system (lines, hoses and connections)		I		I		I		I		I		I		I
Air filter		1	I	R	I	R	ı	R	I	R	I	R	I	R
FUEL SYSTEM														
Fuel lines, hoses and connections		1	ı	ı	I	I	1	I	I	1	I	ı	I	- 1
Fuel filter (Euro V)		R	R	R	R	R	R	R	R	R	R	R	R	R
Fuel filter (Euro VI)						Replace	e every	100,000	0 km or	4 years	5			
Canister		1	I	- 1	I	I	ı	- 1	I	1	I	- 1	I	- 1
Canister filter (Euro VI)		1	I	- 1	I	R	ı	- 1	I	1	R	- 1	I	- 1
IGNITION SYSTEM														
Spark Plugs		1	ı	R	ı	R	ı	R	I	R	I	R	I	R
CHASSIS AND BODY														
Brake/Clutch fluid		1	I	- 1	R	- 1	I	R	I	-	R	1	I	R
Parking brake		1	I	- 1	I	1	I	1	I	-	I	1	I	I
Brake lines, hoses and connections		I	I	I	I	I	I	I	I	I	I	I	I	1

# **CS55**

Disc brakes and pads		I	I	- 1	ı	I	I	I	I	I	I	I	I	I
Steering gear rack, linkage and boots		I	I	I	I	I	I	I	I	ı	ļ	ı	I	I
Driveshaft and boots		I	ı	- 1	I	I	ı	ı	ı	- 1	I	I	ı	1
Tire (pressure & tread wear)		- 1	ı	I	I	I	ı	ı	ı	- 1	- 1	I	I	1
Front suspension ball joints		ı	ı	I	I	- 1	ı	ı	ı	I	I	I	ı	1
Bolt and nuts on chassis and body		I	ı	I	I	I	ı	ı	ı	I	I	ı	ı	1
ELECTRICAL APPLIANCE														
Wiring harness, connections and lamps		I	ı	- 1	ı	I	ı	ı	ı	- 1	I	I	I	1
AIR CONDITIONING														
Air conditioner refrigerant		I	ı	- 1	ı	I	ı	I	ı	- 1	I	ı	I	1
Compressor/Condenser/Evaporator		I	ı	I	I		ı	I	ı	- 1	l	I	I	1
Climate control air filter (if equipped)		Ī	I	R	I	R	I	R	I	R	I	R	I	R
A/C lines and connections			I	I	I		I	I	I	I		I	I	I

## MAINTENANCE UNDER SEVERE USAGE CONDITIONS

The following items must be serviced more frequently on cars mainly used under severe driving conditions. Refer to the chart below for the appropriate maintenance intervals.

Maintenance item	Maintenance operation	Maintenance intervals	Driving condition
Engine oil and engine oil filter	R	Replace every 5,000 km or 6 months	A, B, C, D, E, F, G, H, I, K, L
Air cleaner filter	R	Replace more frequently depending on the condition	C, E
Spark plugs	R	Replace more frequently depending on the condition	A, B, H, I
Steering gear rack, linkage and boots	1	Inspect more frequently depending on the condition	C, D, E, F, G
Front suspension ball joints	1	Inspect more frequently depending on the condition	C, D, E, F, G
Bolt and nuts on chassis and body		Inspect more frequently depending on the condition	C, D, E, F, G
Disc brakes and pads, calipers and rotors	1	Inspect more frequently depending on the condition	C, D, E, F, G
Parking brake	1	Inspect more frequently depending on the condition	C, D, G, H
Driveshaft and boots	1	Inspect more frequently depending on the condition	C, D, E, F, G, H, I
Manual transmission fluid (if equipped)	R	Inspect every 15,000km or 12 months and change fluid if necessary	C, D, E, F, G, H, I, K, M
Automatic transmission fluid (if equipped)	R	Every 60,000km	A, C, F, G, I
Dual clutch transmission (if equipped)	R	Every 40,000km	C, D, F, G, H, I, K
Climate control air filter (if equipped)	R	Replace more frequently depending on the condition	C, E

I: Inspect and if necessary, adjust, correct, clean or replace. R: Replace or change.

### Severe driving conditions

- A: Repeatedly driving short distance of less than 8 km (5 miles) in normal temperature or less than 16 km (10 miles) in freezing temperature
- B: Extensive engine idling or low speed driving for long distances
- C: Driving on rough, dusty, muddy, unpaved, graveled or salt spread roads
- D: Driving in areas using salt or other corrosive materials or in very cold weather
- E: Driving in the heavy dust condition
- F: Driving in heavy traffic area

- G: Driving on uphill, downhill, or mountain roads repeatedly
- H: Towing a trailer, or using a camper or roof rack
- I: Driving for patrol car, taxi, commercial car or vehicle towing
- J: Driving over 140 km/h (87 mile/h)
- K: Driving over 170 km/h (106 mile/h)
- L: Frequently driving in stop-and-go conditions

## **REGULAR MAINTENANCE HISTORY**

Pre-delivery
Repair Order No.:
Date:
Km Reading:
Dealer Stamp:
Service Advisor:
Signature:
First Service 5000km
Repair Order No.:
Date:
Km Reading:
Dealer Stamp:
Service Advisor:
Signature:

15,000km
Repair Order No.:
Deter
Date:
Km Reading:
Dealer Stemp
Dealer Stamp:
Service Advisor:
Germee Advisori
Signature:
25,000km
Repair Order No.:
Repair Order No.:
Repair Order No.:
Repair Order No.:  Date:
Repair Order No.:  Date:
Repair Order No.:  Date:  Km Reading:  Dealer Stamp:
Repair Order No.:  Date:  Km Reading:
Repair Order No.:  Date:  Km Reading:  Dealer Stamp:

35,000km	55,000km
Repair Order No.:	Repair Order No.:
Date:Km Reading:	Date:Km Reading:
Dealer Stamp:	Dealer Stamp:
Comice Advisory	Service Advisor:
Service Advisor: Signature:	Signature:
45,000km	65,000km
Repair Order No.:	Repair Order No.:
Date:	Date:
Km Reading:	Km Reading:
Dealer Stamp:	Dealer Stamp:
Service Advisor:	Service Advisor:
Signature:	Signature:

# *CS55*

75,000km
Repair Order No.:
Date:
Km Reading:
Dealer Stamp:
Service Advisor:
Signature:
85,000km
Repair Order No.:
Date:
Km Reading:
Dealer Stamp:
Service Advisor:
Signature:

95,000km
Repair Order No.:
Date:
Km Reading:
Dealer Stamp:
Service Advisor:
Signature:
Oignataro.
105,000km
Repair Order No.:
Date:
Km Reading:
Dealer Stamp:
Service Advisor:
Signature:

## **SERVICE STATION LIST**

(Please list the information of service station here)

No.	Service Station Name	Service Station No	Address	Tel
1				
2				
3				
4				
5				
6				

## REPAIR HISTORY

No.	Service Station' No.	Repair Date	Mileage	Malfunction Description	Job Card's No.	Replaced Parts' Name	In Warranty	Stamp of Service Station
1							Yes □	
							No □	
2							Yes □	
							No □	
3							Yes □	
							No □	
4							Yes □	
4							No □	
5							Yes □	
3							No □	
6							Yes □	
							No □	

7			Yes □ No □	
8			Yes □ No □	
9			Yes □ No □	
10			Yes □	
11			Yes □	
12			Yes □	
13			Yes □	
14			Yes □	
15			Yes □	
16			Yes □	

17				Yes □ No □	
18				Yes □ No □	