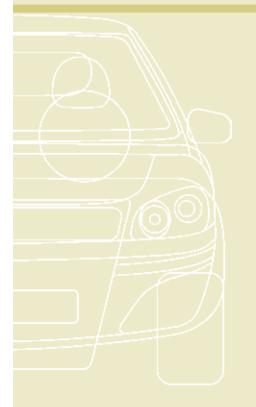
## HYUNDAI



## OWNER'S MANUAL

Operation Maintenance Specifications

All information in this Owner's Manual is current at the time of publication. However, HYUNDAI 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.

Please note that some models are equipped with Right-Hand Drive (RHD). The explanations and illustrations for some operations in RHD models are opposite of those written in this manual.

#### CAUTION: MODIFICATIONS TO YOUR HYUNDAI

Your HYUNDAI should not be modified in any way. Such modifications may adversely affect the performance, safety or durability of your HYUNDAI 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 HYUNDAI 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 WARNING, CAUTION and NOTICE. These titles indicate the following:

## **À** WARNING

This indicates that a condition may result in harm, serious injury or death to you or other persons if the warning is not heeded. Follow the advice provided with the warning.

## ! CAUTION

This indicates that a condition may result in damage to your vehicle or its equipment if the caution is not heeded. Follow the advice provided with the caution.

### **\* NOTICE**

This indicates that interesting or helpful information is being provided.

#### FOREWORD

Thank you for choosing HYUNDAI. We are pleased to welcome you to the growing number of discerning people who drive HYUNDAIs. The advanced engineering and high-quality construction of each HYUNDAI 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 HYUNDAI. 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 manufacturer also recommends that service and maintenance on your vehicle be performed by an authorized HYUNDAI dealer.

### HYUNDAI MOTOR COMPANY

Note : Because future owners will also need the information included in this manual, if you sell this HYUNDAI, please leave the manual in the vehicle for their use. Thank you.

## ! CAUTION

Severe engine and transaxle damage may result from the use of poor quality fuels and lubricants that do not meet HYUNDAI specifications. You must always use high quality fuels and lubricants that meet the specifications listed on Page 8-6 in the Vehicle Specifications section of the Owner's Manual.

Copyright 2018 HYUNDAI Motor Company. All rights reserved. No part of this publication may be reproduced, stored in any retrieval system or transmitted in any form or by any means without the prior written permission of HYUNDAI Motor Company.

TABLE OF CONTENTS	Introduction         Your vehicle at a glance         Safety system of your vehicle	1 2 3
	Features of your vehicleDriving your vehicleWhat to do in an emergencyMaintenanceSpecifications & Consumer information	4 5 6 7 8
	Index	Ι

## Introduction

How to use this manual / 1-2 Fuel requirements / 1-2 Vehicle break-in process / 1-6 Returning used vehicles (for Europe) / 1-6

#### HOW TO USE THIS MANUAL

We want to help you get the greatest possible driving pleasure from 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 CAU-TION 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 sections 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. You will find various WARNINGS, CAU-TIONS, and NOTICES in this manual. These were prepared to enhance your personal safety. You should carefully read and follow ALL procedures and recommendations provided in these WARN-INGS, CAUTIONS and NOTICES.

### **A** WARNING

A WARNING indicates a situation in which harm, serious bodily injury or death could result if the warning is ignored.

### ! CAUTION

A CAUTION indicates a situation in which damage to your vehicle could result if the caution is ignored.

### **\* NOTICE**

A NOTICE indicates interesting or helpful information is being provided.

## FUEL REQUIREMENTS

#### **Gasoline engine**

#### Unleaded

#### For Europe

For the optimal vehicle performance, we recommend you use unleaded gasoline which has an octane rating of RON (Research Octane Number) 95 / AKI (Anti Knock Index) 91 or higher. (Do not use methanol blended fuels.)

You may use unleaded gasoline with an octane rating of RON 91-94 / AKI 87-90 but it may result in slight performance reduction of the vehicle.

#### **Except Europe**

Your new vehicle is designed to use only unleaded fuel having an Octane Rating of RON (Research Octane Number) 91 / AKI (Anti-Knock Index) 87 or higher. (Do not use methanol blended fuels.)

Your new vehicle is designed to obtain maximum performance with UNLEADED FUEL, as well as minimize exhaust emissions and spark plug fouling.

## ! 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 HYUNDAI dealer for details.)

## **A** WARNING

- Do not "top off" after the nozzle automatically shuts off when refueling.
- Always check that the fuel cap is installed securely to prevent fuel spillage in the event of an accident.

#### Leaded (if equipped)

For some countries, your vehicle is designed to use leaded gasoline. When you are going to use leaded gasoline, we recommend that you ask an authorized HYUNDAI dealer whether leaded gasoline in your vehicle is available or not. Octane Rating of leaded gasoline is same with unleaded one.

## 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 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 damage 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 fuels such as;

- Silicone (Si) contained fuel,
- MMT (Manganese, Mn) contained fuel,
- Ferrocene (Fe) contained fuel, and

- Other metalic additives contained fuels, may cause vehicle and engine damage or cause plugging, misfiring, poor acceleration, engine stalling, catalyst melting, abnormal corrosion, life cycle reduction, etc.

Also, the Malfunction Indicator Lamp (MIL) may illuminate.

### **\* NOTICE**

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

HYUNDAI 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.

#### **Fuel Additives**

HYUNDAI recommends that you use unleaded gasoline which has an octane rating of RON (Research Octane Number) 95 / AKI (Anti Knock Index) 91 or higher (for Europe) or Octane Rating of RON (Research Octane Number) 91 / AKI (Anti-Knock Index) 87 or higher (except Europe).

For customers who do not use good quality gasolines including fuel additives regularly, and have problems starting or the engine does not run smoothly, one bottle of additive added to the fuel tank according to the maintenance schedule is recommended (refer to chapter 7, "Normal Maintenance Schedule"). Additives are available from your authorized HYUNDAI dealer along with information on how to use them. Do not mix other additives.

#### 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.

#### **Diesel engine**

#### Diesel fuel

Diesel engine must be operated only on commercially available diesel fuel that complies with EN 590 or comparable standard. (EN stands for "European Norm"). Do not use marine diesel fuel, heating oils, or non-approved fuel additives, as this will increase wear and cause damage to the engine and fuel system. The use of non-approved fuels and / or fuel additives will result in a limitation of your warranty rights.

Diesel fuel of above cetane 51 is used in your vehicle. If two types of diesel fuel are available, use summer or winter fuel properly according to the following temperature conditions.

- Above -5°C (23°F) ... Summer type diesel fuel.
- Below -5°C (23°F) ... Winter type diesel fuel.

Watch the fuel level in the tank very carefully : If the engine stops through fuel failure, the circuits must be completely purged to permit restarting.

## ! CAUTION

Do not let any gasoline or water enter the tank. This would make it necessary to drain it out and to bleed the lines to avoid jamming the injection pump and damaging the engine.

#### ! CAUTION - Diesel Fuel (if equipped with DPF)

It is recommended to use the regulated automotive diesel fuel for diesel vehicle equipped with the DPF system.

If you use diesel fuel including high sulfur (more than 50 ppm sulfur) and unspecified additives, it can cause the DPF system to be damaged and white smoke can be emitted.

#### Biodiesel

Commercially supplied Diesel blends of no more than 7% biodiesel, commonly known as "B7 Diesel" may be used in vour vehicle if Biodiesel meets EN 14214 or equivalent specifications. (EN stands for "European Norm"). The use of biofuels exceeding 7% made from rapeseed methyl ester (RME), fatty acid methyl ester (FAME), vegetable oil methyl ester (VME) etc. or mixing diesel exceeding 7% with biodiesel will cause increased wear or damage to the engine and fuel system. Repair or replacement of worn or damaged components due to the use of non approved fuels will not be covered by the manufactures warranty.

### ! CAUTION

- Never use any fuel, whether diesel, B7 biodiesel or otherwise, that fails to meet the latest petro-leum industry specification.
- Never use any fuel additives or treatments that are not recommended or approved by the vehicle manufacturer.

### **VEHICLE BREAK-IN PROCESS**

No special break-in period is needed. By following a few simple precautions for the first 1,000 km (600 miles) you may add to the performance, economy and life of your vehicle.

- Do not race the engine.
- While driving, keep your engine speed (rpm, or revolutions per minute) between 2,000 rpm and 4,000 rpm.
- Do not maintain a single speed for long periods of time, either fast or slow. Varying engine speed is needed to properly break-in the engine.
- Avoid hard stops, except in emergencies, to allow the brakes to seat properly.
- Don't tow a trailer during the first 2,000 km (1,200 miles) of operation.

#### RETURNING USED VEHICLES (FOR EUROPE)

HYUNDAI promotes an environmentally sound treatment for end of life vehicles and offers to take back your HYUNDAI end of life vehicles in accordance with the European Union (EU) End of Life Vehicles Directive.

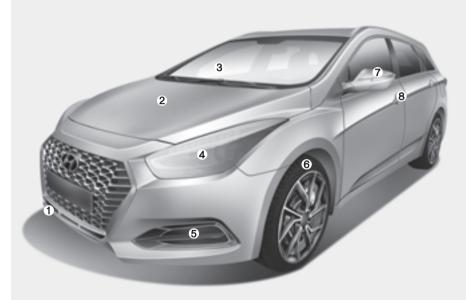
You can get detailed information from your national HYUNDAI homepage.

## Your vehicle at a glance

Exterior overview (I) (wagon) / 2-2 Exterior overview (I) (sedan) / 2-3 Exterior overview (II) (wagon) / 2-4 Exterior overview (II) (sedan) / 2-5 Instrument panel overview / 2-6 Interior overview / 2-10 Engine compartment / 2-12

## EXTERIOR OVERVIEW (I) (WAGON)

Front

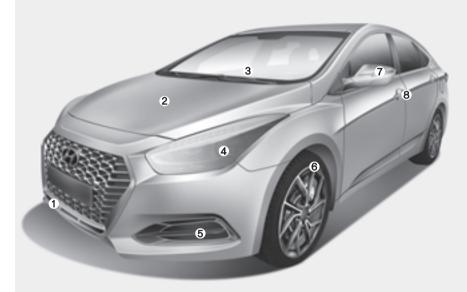


1. Front removable towing hook	6-37
2. Hood	4-47
3. Front windshield wiper	4-125
4. Head lamp	4-115
5. Front fog lamp	4-122
6. Tire and wheel	7-50
7. Outside rearview mirror	4-62
8. Door lock	4-22

The actual shape may differ from the illustration.

## EXTERIOR OVERVIEW (I) (SEDAN)

#### Front

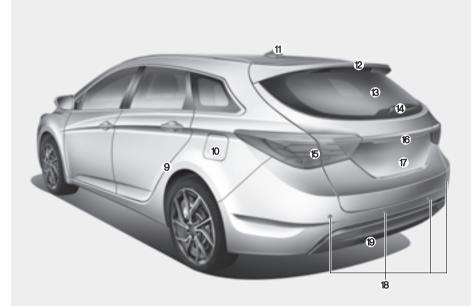


1. Front removable towing hook	6-37
2. Hood	4-47
3. Front windshield wiper	4-125
4. Head lamp	4-115
5. Front fog lamp	4-122
6. Tire and wheel	7-50
7. Outside rearview mirror	4-62
8. Door lock	4-22

The actual shape may differ from the illustration.

## **EXTERIOR OVERVIEW (II) (WAGON)**

Rear

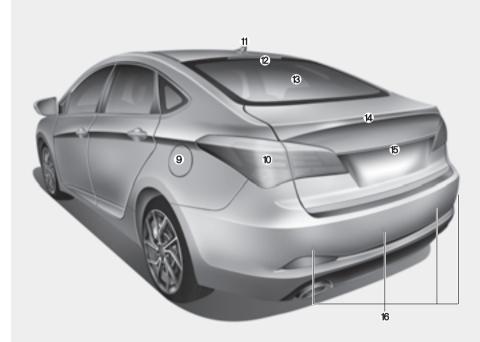


9. Child-protector rear door lock	4-26
10. Fuel filler door	4-49
11. Antenna	4-176
12. High mounted stop lamp	7-97
13. Rear window defroster	4-133
14. Rear wiper	4-128
15. Rear combination lamp	7-90
16. Rear View Monitor	4-112
17. Tailgate	4-27
18. Parking Distance Warning	
(Reverse/Forward)	4-98
19. Rear towing hook	6-37

The actual shape may differ from the illustration.

## EXTERIOR OVERVIEW (II) (SEDAN)

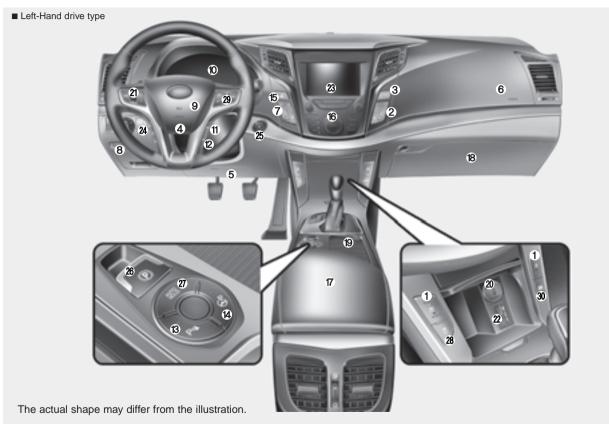
#### Rear



9. Fuel filler door	4-49
10. Rear combination lamp	7-93
11. Antenna	4-176
12. High mounted stop lamp	7-97
13. Rear window defroster	4-133
14. Trunk	4-37
15. Rear View Monitor	4-112
16. Parking Distance Warning (Reverse/Forward)	4-98

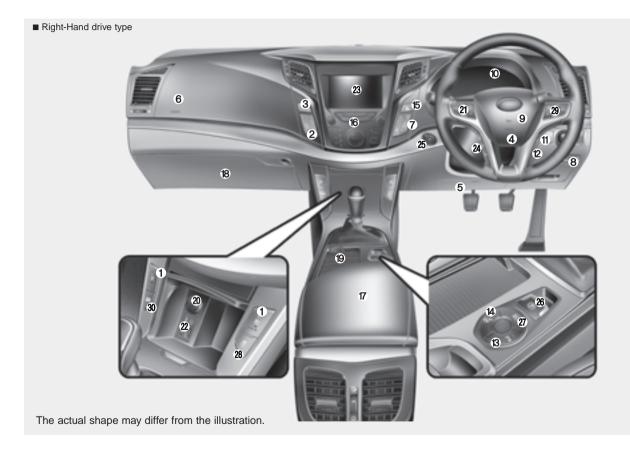
The actual shape may differ from the illustration.

## **INSTRUMENT PANEL OVERVIEW**



1. Seat warmer/Air ventilation seat	.3-11/3-12
2. Front passenger's seat belt warning light	3-20
3. Passenger's front air bag ON/OFF indicator	3-45
4. Driver's front air bag	3-49
5. Driver's knee air bag	3-49
6. Passenger's front air bag	3-49
7. Central door lock/unlock switch	4-23
8. Power tailgate open button/Trunk lid release switch	.4-29/4-37
9. Horn	4-60
10. Instrument cluster	4-65
11. LCD display button	4-70
12. Trip button	4-70
13. Parking Distance Warning (Reverse/Forward) system	
button	4-98
14. Parking Assist button	4-107
15. Hazard warning flasher	6-2

16. Climate control system	4-134/4-144
17. Center console storage	4-160
18. Glove box	4-160
19. Cup holder/Ashtray	4-165/4-164
20. Power outlet/Cigarette lighter	4-166/4-164
21. Steering wheel audio controls	4-177
22. AUX, USB and ipod	4-167
23. Audio/AVN system	4-182/Separate Manual
24. Bluetooth phone controls	4-178
25. Engine start/stop button	5-9
26. Electronic parking brake(EPB) switch.	5-37
27. Auto hold control button	5-42
28. Electronic stability control (ESC) button	5-47
29. Cruise control switch / Speed limiter s	witch5-66/5-71
30. Drive mode button	5-32



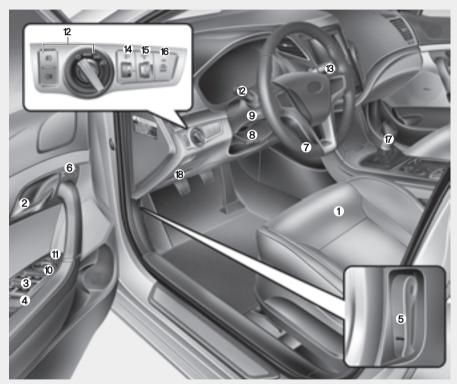
OVF028002R

1. Seat warmer/Air ventilation seat	.3-11/3-12
2. Front passenger's seat belt warning light	3-20
3. Passenger's front air bag ON/OFF indicator	3-45
4. Driver's front air bag	3-49
5. Driver's knee air bag	3-49
6. Passenger's front air bag	3-49
7. Central door lock/unlock switch	4-23
8. Power tailgate open button/Trunk lid release switch	.4-29/4-37
9. Horn	4-60
10. Instrument cluster	4-65
11. LCD display button	4-70
12. Trip button	4-70
13. Parking Distance Warning (Reverse/Forward) system	
button	4-98
14. Parking Assist button	4-107
15. Hazard warning flasher	6-2

16. Climate control system	4-134/4-144
17. Center console storage	4-160
18. Glove box	4-160
19. Cup holder/Ashtray	4-165/4-164
20. Power outlet/Cigarette lighter	4-166/4-164
21. Steering wheel audio controls	4-177
22. AUX, USB and ipod	4-167
23. Audio/AVN system	4-182/Separate Manual
24. Bluetooth phone controls	4-178
25. Engine start/stop button	5-9
26. Electronic parking brake(EPB) switch.	5-37
27. Auto hold control button	5-42
28. Electronic stability control (ESC) button	5-47
29. Cruise control switch / Speed limiter s	witch5-66/5-71
30. Drive mode button	5-32

## **INTERIOR OVERVIEW**

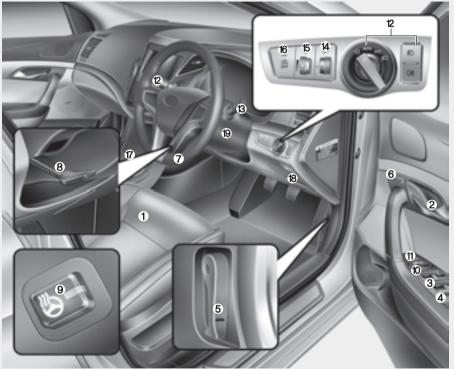
■ Left-Hand drive type



1. Seat3-2
2. Inside door handle4-23
3. Power window switch4-43
4. Power window lock switch4-46
5. Hood release lever4-47
6. Driver position memory seat4-56
7. Steering wheel4-58
8. Tilt and telescopic steering control lever4-59
9. Heated steering wheel4-59
10. Outside rearview mirror control4-63
11. Outside rearview mirror folding4-64
12. Light switch4-118
13. Wiper/Washer4-125
14. Headlight leveling device4-123
15. Instrument panel illumination control system4-66
16. Idle Stop and Go (ISG) OFF button5-16
17. Manual transaxle shift lever/
Dual clutch transmission shift lever
5-20/5-23
18. Fuse box7-66

The actual shape may differ from the illustration.

#### ■ Right-Hand drive type



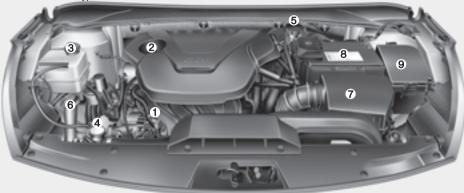
1. Seat	-2
2. Inside door handle4-2	23
3. Power window switch4-4	13
4. Power window lock switch4-4	16
5. Hood release lever4-4	17
6. Driver position memory seat4-5	56
7. Steering wheel4-5	58
8. Tilt and telescopic steering control lever 4-5	59
9. Heated steering wheel4-5	59
10. Outside rearview mirror control4-6	33
11. Outside rearview mirror folding4-6	34
12. Light switch4-11	
13. Wiper/Washer4-12	25
14. Headlight leveling device4-12	23
15. Instrument panel illumination control system4-6	56
16. Idle Stop and Go (ISG) OFF button5-1	
17. Manual transaxle shift lever/ Dual clutch transmission shift lever	
5-20/5-2	23
18. Fuse box7-6	
19. Ignition switch5-	-5

The actual shape may differ from the illustration.

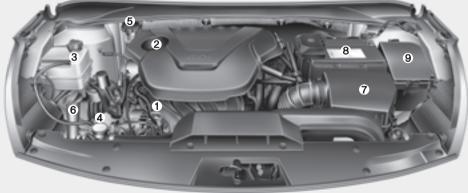
OVF028115R

## **ENGINE COMPARTMENT**

Gasoline (1.6L)
 Left-Hand drive type



• Right-Hand drive type



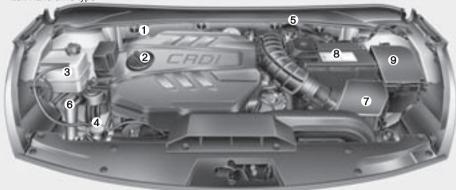
1. Engine oil dipstick	.7-33
2. Engine oil filler cap	.7-33
3. Engine coolant reservoir	.7-37
4. Radiator cap	.7-37
5. Brake/clutch fluid reservoir	.7-38
6. Windshield washer fluid reservoir	.7-39
7. Air cleaner	.7-40
8. Battery	.7-47
9. Fuse box	.7-71

The actual engine compartment in the vehicle may differ from the illustration.

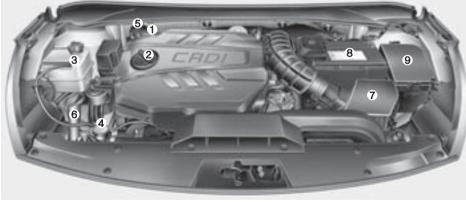
OVF076002/OVF076002R

#### ■ Diesel Engine (Smartstream D1.6)

• Left-Hand drive type



• Right-Hand drive type



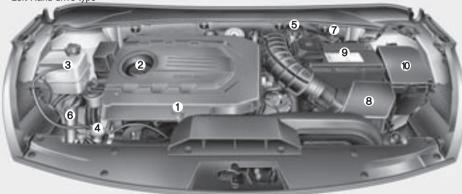
1. Engine oil dipstick7-	34
2. Engine oil filler cap7-	35
3. Engine coolant reservoir7-	37
4. Radiator cap7-	37
5. Brake/clutch fluid reservoir7-	38
6. Windshield washer fluid reservoir 7-	39
7. Air cleaner7-	40
8. Battery7-	47
9. Fuse box	71

The actual engine compartment in the vehicle may differ from the illustration.

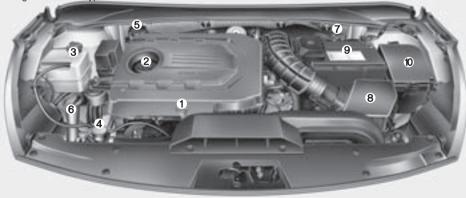
OVF078003L/OVF078003R

## Your vehicle at a glance

## Diesel Engine (1.7L) Left-Hand drive type



• Right-Hand drive type



1. Engine oil dipstick	7-34
2. Engine oil filler cap	7-35
3. Engine coolant reservoir	7-37
4. Radiator cap	7-37
5. Brake/clutch fluid reservoir	7-38
6. Windshield washer fluid reservoir.	7-39
7. Fuel filter	7-40
8. Air cleaner	7-40
9. Battery	7-47
10. Fuse box	7-71

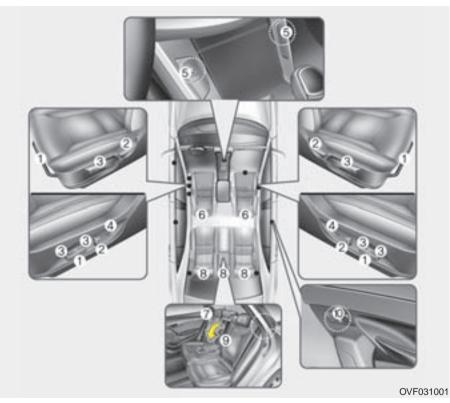
The actual engine compartment in the vehicle may differ from the illustration.

OVF076003L/OVF076003R

Seat / 3-2 Seat belts / 3-19 Child restraint system / 3-30 Airbag-supplemental restraint system / 3-41

## Safety system of your vehicle

## SEAT



### Front seat

- (1) Forward and rearward
- (2) Seatback angle
- (3) Seat cushion height\*
- (4) Lumbar support
- (5) Seat warmer\*/
  - Seat warmer with air ventilation\*
- (6) Headrest

### Rear seat

- (7) Seatback folding
- (8) Headrest
- (9) Armrest
- (10) Seat warmer\*
- \* : if equipped

WARNING - Loose objects Loose objects in the driver's foot area could interfere with the operation of the foot pedals, possibly causing an accident. Do not place anything under the front seats.

## WARNING - Uprighting seat

When you return the seatback to its upright position, hold the seatback and return it slowly and be sure there are no other occupants around the seat. If the seatback is returned without being held and controlled, the back of the seat could spring forward resulting in accidental injury to a person struck by the seatback.

# WARNING - Driver responsibility for front seat passenger

Riding in a vehicle with a front seatback reclined could lead to serious or fatal injury in an accident. If a front seat is reclined during an accident, the occupant's hips may slide under the lap portion of the seat belt applying great force to the unprotected abdomen. Serious or fatal internal injuries could result. The driver must advise the front passenger to keep the seatback in an upright position whenever the vehicle is in motion.

## A WARNING

Do not use a sitting cushion that reduces friction between the seat and passenger. The passenger's hips may slide under the lap portion of the seat belt during an accident or a sudden stop. Serious or fatal internal injuries could result because the seat belt can't operate normally.

#### A WARNING - Driver's seat

- Never attempt to adjust seat while the vehicle is moving. This could result in loss of control, and an accident causing death, serious injury, or property damage.
- Do not allow anything to interfere with the normal position of the seatback. Storing items against a seatback or in any other way interfering with proper locking of a seatback could result in serious or fatal injury in a sudden stop or collision.
- Always drive and ride with your seatback upright and the lap portion of the seat belt snug and low across the hips. This is the best position to protect you in case of an accident.
- In order to avoid unnecessary and perhaps severe air bag injuries, always sit as far back as possible from the steering wheel while maintaining comfortable control of the vehicle. It is recommended that your chest is at least 250 mm (10 inches) away from the steering wheel.

## A WARNING - Rear seatbacks

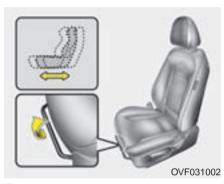
- The rear seatback must be securely latched. If not, passengers and objects could be thrown forward resulting in serious injury or death in the event of a sudden stop or collision.
- Luggage and other cargo should be laid flat in the cargo area. If objects are large, heavy, or must be piled, they must be secured. Under no circumstances should cargo be piled higher than the seatbacks. Failure to follow these warnings could result in serious injury or death in the event of a sudden stop, collision or rollover.
- No passenger should ride in the cargo area or sit or lie on folded seatbacks while the vehicle is moving. All passengers must be properly seated in seats and restrained properly while riding.
- When resetting the seatback to the upright position, make sure it is securely latched by pushing it forward and backwards.

### A WARNING

After adjusting the seat, always check that it is securely locked into place by attempting to move the seat forward or backward without using the lock release lever. Sudden or unexpected movement of the driver's seat could cause you to lose control of the vehicle resulting in an accident.

## A WARNING

- Use extreme caution so that hands or other objects are not caught in the seat mechanisms while the seat is moving.
- Do not put a cigarette lighter on the floor or seat. When you operate the seat, gas may gush out of the lighter and cause fire.
- If there are occupants in the rear seats, be careful while adjusting the front seat position.
- Use extreme caution when picking small objects trapped under the seats or between the seat and the center console. Your hands might be cut or injured by the sharp edges of the seat mechanism.



#### Front seat

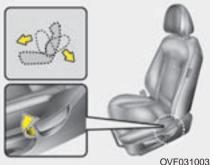
Manual adjustment

#### Forward and backward

To move the seat forward or backward:

- 1. Pull the seat slide adjustment lever up and hold it.
- 2. Slide the seat to the position you desire.
- 3. Release the lever and make sure the seat is locked in place.

Adjust the seat before driving, and make sure the seat is locked securely by trying to move forward and backward without using the lever. If the seat moves, it is not locked properly.

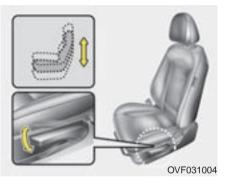


#### OVF0310

#### Seatback angle

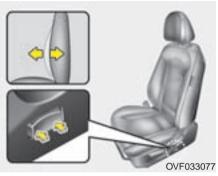
To recline the seatback:

- 1. Lean forward slightly and lift up on the seatback recline lever.
- 2. Carefully lean back on the seat and adjust the seatback of the seat to the position you desire.
- 3. Release the lever and make sure the seatback is locked in place. (The lever MUST return to its original position for the seatback to lock.)



Seat cushion height (if equipped) To change the height of the seat cushion, push the lever upwards or downwards.

- To lower the seat cushion, push down the lever several times.
- To raise the seat cushion, pull up the lever several times.



#### Lumbar support

The lumbar support can be adjusted by pressing the lumbar support switch on the side of the seat.

- 1. Press the front portion of the switch to increase support, or the rear portion of the switch, to decrease support.
- 2. Release the switch once it reaches the desired position.

35

#### Automatic adjustment (if equipped)

The front seat can be adjusted by using the control switches located on the outside of the seat cushion. Before driving, adjust the seat to the proper position so as to easily control the steering wheel, pedals and switches on the instrument panel.

## A WARNING

The power seat is operable with the ignition OFF.

Therefore, children should never be left unattended in the car.

## ! CAUTION

- The power seat is driven by an electric motor. Stop operating once the adjustment is completed. Excessive operation may damage the electrical equipment.
- When in operation, the power seat consumes a large amount of electrical power. To prevent unnecessary charging system drain, don't adjust the power seat longer than necessary while the engine is not running.
- Do not operate two or more power seat control switches at the same time. Doing so may result in power seat motor or electrical component malfunction.
- Do not change the seat cover. It may damage the seat warmer or airventilation system.



#### Forward and rearward

- 1. Push the control switch forward or rearward to move the seat to the desired position.
- 2. Release the switch once the seat reaches the desired position.



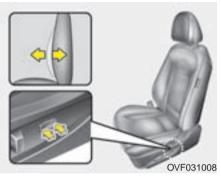
#### Seatback angle

- 1. Push the control switch forward or rearward to move the seatback to the desired angle.
- 2. Release the switch once the seat reaches the desired position.



#### Seat cushion height (if equipped)

- 1. Pull the front portion of the control switch up to raise or down to lower the front part of the seat cushion. Pull the rear portion of the control switch up to raise or down to lower the rear part of the seat cushion.
- 2. Release the switch once the seat reaches the desired position.

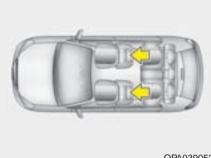


#### Lumbar support (if equipped)

The lumbar support can be adjusted by pressing the lumbar support switch on the side of the seat.

- 1. Press the front portion of the switch to increase support, or the rear portion of the switch, to decrease support.
- 2. Release the switch once it reaches the desired position.

3 7



OPA039052

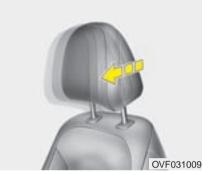
#### Headrest

The driver's and front passenger's seats are equipped with a headrest for the occupant's safety and comfort.

The headrest not only provides comfort for the driver and front passenger, but also helps protect the head and neck in the event of a collision.

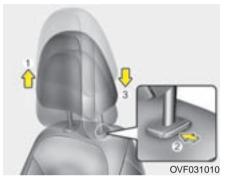
## A WARNING

- For maximum effectiveness in case of an accident, the headrest should be adjusted so the middle of the headrest is at the same height of the center of gravity of an occupant's head. Generally, the center of gravity of most people's head is similar with the height of the top of their eyes. Also, adjust the headrest as close to your head as possible. For this reason, the use of a cushion that holds the body away from the seatback is not recommended
- Do not operate the vehicle with the headrests removed as severe injury to the occupants may occur in the event of an accident. Headrests may provide protection against neck injuries when properly adjusted.
- Do not adjust the headrest position of the driver's seat while the vehicle is in motion.



Forward and rearward adjustment

The headrest may be adjusted forward to 4 different positions by pulling the headrest forward to the desired detent. To adjust the headrest to it's furthest rearwards position, pull it fully forward to the farthest position and release it. Adjust the headrest so that it properly supports the head and neck.



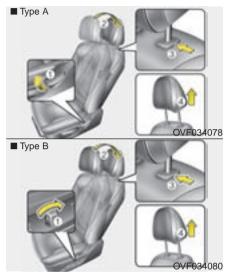
#### Adjusting the height up and down

To raise the headrest, pull it up to the desired position (1). To lower the headrest, push and hold the release button (2) on the headrest support and lower the headrest to the desired position (3).



## ! CAUTION

If you recline the seatback towards the front with the headrest and seat cushion raised, the headrest may come in contact with the sunvisor or other parts of the vehicle.



#### **Removal/Reinstall**

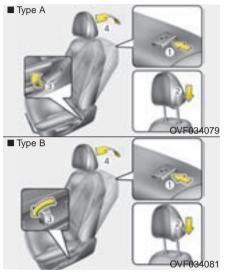
To remove the headrest:

- 1. Recline the seatback(2) with the recline lever (1).
- 2. Raise headrest as far as it can go.
- 3. Press the headrest release button (3) while pulling the headrest up (4).

## A WARNING

NEVER allow anyone to ride in a seat with the headrest removed.

## Safety system of your vehicle



## 

Always make sure the headrest locks into position after reinstalling and adjusting it properly.



#### Active headrest

The active headrest is designed to move forward and upward during a rear impact. This helps prevent the driver's and front passenger's heads from moving backward and thus helps minimize neck injuries.

## A WARNING

A gap between the seat and the headrest release button may appear when seating on the seat or when you push or pull the seat. Be careful not to get your finger, etc. caught in the gap.

To reinstall the headrest :

- 1. Put the headrest poles (2) into the holes while pressing the release button (1).
- 2. Recline the seatback(4) with the recline lever (3).
- 3. Adjust the headrest to the appropriate height.



Seat warmer (if equipped)

The seat warmer is provided to warm the front seats during cold weather. With the ignition switch in the ON position, push either of the switches to warm the driver's seat or the front passenger's seat. During mild weather or under conditions where the operation of the seat warmer is not needed, keep the switches in the "OFF" position.

• Each time you press the switch, the temperature setting of the seat will change as follows :

• The seat warmer defaults to the OFF position whenever the ignition switch is turned on.

## **\* NOTICE**

With the seat warmer switch in ON position, the heating system in the seat turns off or on automatically depending on the seat temperature.

#### .! CAUTION - Seat damage

- When cleaning the seats, do not use an organic solvent such as paint thinner, benzene, alcohol and gasoline. Doing so may damage the surface of the heater or seats.
- To prevent overheating the seat warmer, do not place anything on the seats that insulates against heat, such as blankets, cushions or seat covers on the seats while the seat warmer is in operation.
- Do not place heavy or sharp objects on seats equipped with seat warmers. Damage to the seat warming components could occur.
- Do not change the seat cover. It may damage the seat warmer or airventilation system.

# WARNING - Seat warmer burns

Passengers should use extreme caution when using seat warmers due to the possibility of excess heating or burns. The occupants must be able to feel if the seat is becoming too warm and to turn the seat warmer off. The seat warmer may cause burns even at low temperatures, especially if used for long periods of time.

In particular, the driver must exercise extreme care for the following types of passengers:

- 1. Infants, children, elderly or disabled persons, or hospital outpatients
- 2. Persons with sensitive skin or those that burn easily
- **3. Fatigued individuals**
- 4. Intoxicated individuals
- 5. Individuals taking medication that can cause drowsiness or sleepiness (sleeping pills, cold tablets, etc.)



*Air ventilation seat (if equipped)* The air ventilation is provided to cool the front seats during hot weather by blowing air through small vent holes on the surface of the seats and seatbacks. While the engine is running, push the rear portion of the switch to cool the driver's seat or the front passenger's seat.

When the operation of the air ventilation is not needed, keep the switches in the OFF position.

• Each time you press the switch, the airflow will change as follows:

### 

1

- When the air ventilation seat is turned on, the seat may get cooler after about 5 minutes.
- The air ventilation seat defaults to the OFF position whenever the ignition switch is turned to the ON position.

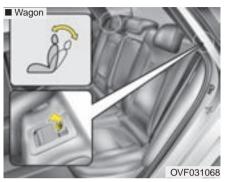


Seatback pocket

The seatback pocket is provided on the back of the front passenger's and driver's seatbacks.

# WARNING - Seatback

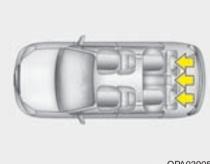
Do not put heavy or sharp objects in the seatback pockets. In an accident they could come loose from the pocket and injure vehicle occupants.



### **Rear seat**

*Seatback angle (Wagon)* To recline the seatback:

- 1. Pull up the seatback recline lever.
- 2. Hold the lever and adjust the seatback of the seat to the position you desire.
- Release the lever and make sure the seatback is locked in place. (The lever MUST return to its original position for the seatback to lock.)



OPA039053

### Headrest

The rear seat is equipped with headrests in all the seating positions for the occupant's safety and comfort.

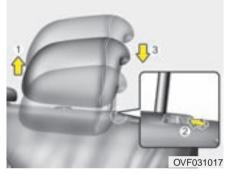
The headrest not only provides comfort for passengers, but also helps protect the head and neck in the event of a collision.

# A WARNING

- For maximum effectiveness in case of an accident, the headrest should be adjusted so the middle of the headrest is at the same height of the center of gravity of an occupant's head. Generally, the center of gravity of most people's head is similar with the height of the top of their eyes. Also adjust the headrest as close to your head as possible. For this reason, the use of a cushion that holds the body away from the seatback is not recommended.
- Do not operate the vehicle with the headrests removed. Severe injury to an occupant may occur in the event of an accident. Headrests may provide protection against severe neck injuries when properly adjusted.

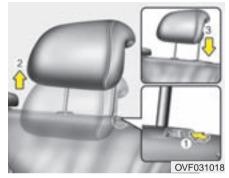
## ! CAUTION

When there is no occupant in the rear seats, adjust the height of the headrest to the lowest position. The rear seat headrest can reduce the visibility of the rear area.



### Adjusting the height up and down

To raise the headrest, pull it up to the desired position (1). To lower the headrest, push and hold the release button (2) on the headrest support and lower the headrest to the desired position (3).



#### **Removal and installation**

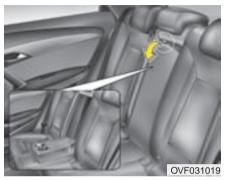
To remove the headrest, raise it as far as it can go then press the release button (1) while pulling the headrest up (2).

To reinstall the headrest, put the headrest poles (3) into the holes while pressing the release button (1). Then adjust it to the appropriate height.

# A WARNING

Make sure the headrest locks in position after adjusting it to properly protect the occupants.

3 14



### Armrest

To use the armrest, pull it forward from the seatback.



### Seat warmer (if equipped)

The seat warmer is provided to warm the rear seats during cold weather. With the ignition switch in the ON position, push either of the switches to warm rear seats. During mild weather or under conditions where the operation of the seat warmer is not needed, keep the switches in the "OFF" position.

• Each time you press the button, the temperature setting of the seat will change as follows :

 $OFF \rightarrow HIGH() \implies) \rightarrow LOW()$ 

• The seat warmer defaults to the OFF position whenever the ignition switch is turned on.

## **\* NOTICE**

With the seat warmer switch in ON position, the heating system in the seat turns off or on automatically depending on the seat temperature.

## .! CAUTION - Seat damage

- When cleaning the seats, do not use an organic solvent such as paint thinner, benzene, alcohol and gasoline. Doing so may damage the surface of the heater or seats.
- To prevent overheating the seat warmer, do not place anything on the seats that insulates against heat, such as blankets, cushions or seat covers on the seats while the seat warmer is in operation.
- Do not place heavy or sharp objects on seats equipped with seat warmers. Damage to the seat warming components could occur.
- Do not change the seat cover. It may damage the seat warmer or airventilation system.

# WARNING - Seat warmer burns

Passengers should use extreme caution when using seat warmers due to the possibility of excess heating or burns. The occupants must be able to feel if the seat is becoming too warm and to turn the seat warmer off. The seat warmer may cause burns even at low temperatures, especially if used for long periods of time.

In particular, the driver must exercise extreme care for the following types of passengers:

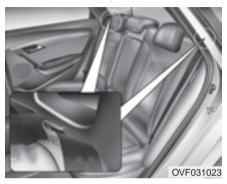
- 1. Infants, children, elderly or disabled persons, or hospital outpatients
- 2. Persons with sensitive skin or those that burn easily
- **3. Fatigued individuals**
- 4. Intoxicated individuals
- 5. Individuals taking medication that can cause drowsiness or sleepiness (sleeping pills, cold tablets, etc.)

#### Folding the rear seat

The rear seatbacks can be folded to facilitate carrying long items or to increase the luggage capacity of the vehicle.

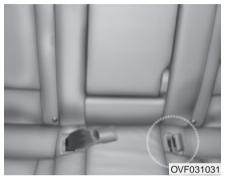
## A WARNING

The purpose of the fold-down rear seatbacks is to allow you to carry longer objects that could not be accommodated in the cargo area. Never allow passengers sit on top of the folded down seatback while the vehicle is moving. This is not a proper seating position and no seat belts are available for use. This could result in serious injury or death in case of an accident or sudden stop. Objects carried on the folded down seatback should not extend higher than the top of the front seatbacks. This could allow cargo to slide forward and cause injury or damage during sudden stops.



To fold down the rear seatback:

 Make sure the rear seat belt webbing is in the guide to prevent the seat belt from being damaged.



- Insert the rear seat belt buckle in the pocket.
- 3. Set the front seatback to the upright position and if necessary, slide the front seat forward.
- 4. Lower the rear headrests to the lowest position.



## 5. Type A

Pull on the seatback folding lever, then fold the seat toward the front of the vehicle.

## Type B (wagon, remote folding)

Pull on the seatback folding lever, then the rear seatback will be folded.



- 6. To use the rear seat, lift and push the seatback backward. Push the seatback firmly until it clicks into place. Make sure the seatback is locked in place.
- 7. Return the rear seat belt to the proper position.

# . ! CAUTION - Type B

Do not strongly push back the seatback to lock. It may be unlocked and returned by repulsive power.

## A WARNING - Type B

Do not fold the rear seats, if passengers, pets or luggage are in the rear seats. It may cause injury or damage to passengers, pets, luggage.

## A WARNING

When you return the rear seatback to its upright position after being folded down:

Be careful not to damage the seat belt webbing or buckle. Do not allow the seat belt webbing or buckle to get caught or pinched in the rear seat. Ensure that the seatback is completely locked into its upright position by pushing on the top of the seatback. Otherwise, in an accident or sudden stop, the seat could fold down and allow cargo to enter the passenger compartment, which could result in serious injury or death.

# A WARNING - Uprighting seat

When you return the seatback to its upright position, hold the seatback and return it slowly. If the seatback is returned without holding it, the back of the seat could spring forward resulting in injury caused by being struck by the seatback.

# **CAUTION -** Damaging rear seat belt buckles

When you fold the rear seatback or put luggage on the rear seat cushion, insert the buckle in the pocket between the rear seatback and cushion. Doing so can prevent the buckle from being damaged by the rear seatback or luggage.

**!** CAUTION - Rear seat belts When returning the rear seatbacks to the upright position, remember to return the rear shoulder belts to their proper position. Routing the seat belt webbing through the rear seat belt guides will help keep the belts from being trapped behind or under the seats.

## A WARNING - Cargo

Cargo should always be secured to prevent it from being thrown about the vehicle in a collision and causing injury to the vehicle occupants. Special care of objects should be taken when placing them in the rear seats, since those may hit the front seat occupants in a frontal collision.

## A WARNING - Cargo loading

Make sure the engine is off, the dual clutch transmission is in P (Park) or the manual transaxle is in R (Reverse) or 1st, and the parking brake is securely applied whenever loading or unloading cargo. Failure to take these steps may allow the vehicle to move if the shift lever is inadvertently moved to another position.

## SEAT BELTS

### Seat belt restraint system

# A WARNING

- For maximum restraint system protection, the seat belts must always be used whenever the car is moving.
- Seat belts are most effective when seatbacks are in the upright position.
- Children age 12 and younger must always be properly restrained in the rear seat. Never allow children to ride in the front passenger seat. If a child over 12 must be seated in the front seat, he/she must be properly belted and the seat should be moved as far back as possible.
- Never wear the shoulder belt under your arm or behind your back. An improperly positioned shoulder belt can cause serious injuries in a crash. The shoulder belt should be positioned midway over your shoulder across your collarbone.

(Continued)

### (Continued)

- Avoid wearing twisted seat belts. A twisted belt can't do its job as well. In a collision, it could even cut into you. Be sure the belt webbing is straight and not twisted.
- Be careful not to damage the belt webbing or hardware. If the belt webbing or hardware is damaged, replace it.
- Never wear a seat belt over fragile objects. If there is a sudden stop or impact, the seat belt can damage it.

## A WARNING

Seat belts are designed to bear upon the bony structure of the body, and should be worn low across the front of the pelvis or the pelvis, chest and shoulders, as applicable; wearing the lap section of the belt across the abdominal area must be avoided.

Seat belts should be adjusted as firmly as possible, consistent with comfort, to provide the protection for which they have been designed. A slack belt will greatly reduce the protection afforded to the wearer.

Care should be taken to avoid contamination of the webbing with polishes, oils and chemicals, and particularly battery acid.

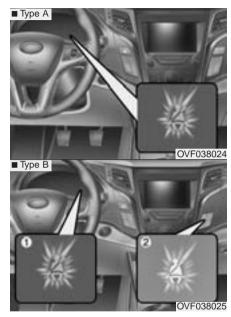
(Continued)

### (Continued)

Cleaning may safely be carried out using mild soap and water. The belt should be replaced if webbing becomes frayed, contaminated or damaged. It is essential to replace the entire assembly after it has been worn in a severe impact even if damage to the assembly is not obvious. Belts should not be worn with straps twisted. Each belt assembly must only be used by one occupant; it is dangerous to put a belt around a child being carried on the occupant's lap.

## A WARNING

- No modifications or additions should be made by the user which will either prevent the seat belt adjusting devices from operating to remove slack, or prevent the seat belt assembly from being adjusted to remove slack.
- When you fasten the seat belt, be careful not to latch the seat belt in buckles of other seat. It's very dangerous and you may not be protected by the seat belt properly.
- Do not unfasten the seat belt and do not fasten and unfasten the seat belt repeatedly while driving. This could result in loss of control, and an accident causing death, serious injury, or property damage.
- When fastening the seat belt, make sure that the seat belt does not pass over objects that are hard or can break easily.
- Make sure there is nothing in the buckle. The seat belt may not be fastened securely.



Seat belt warning

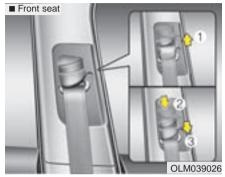
- (1) Driver's seat belt warning light
- (2) Front passenger's seat belt warning light

As a reminder to the driver and passenger, the seatbelt warning light will blink or illuminate and warning chime will sound as follows:

- The seat belt warning light will illuminate each time you turn the ignition switch ON or start the engine regardless of belt fastening.
- If you continue not to fasten the seat belt and you drive over 20 km/h (12 mph), the seat belt warning chime will sound for approximately 100 seconds and the corresponding warning light will blink.
- The seat belt warning light will illuminate if the belt is unfastened after the ignition switch is ON
- After fastening the seat belt and drive over 20 km/h (12 mph), if you unfasten the seat belt then the seat belt warning chime will sound for approximately 100 seconds and the corresponding warning light will blink.

## **\* NOTICE**

- You can find the front passenger's seat belt warning light on the center fascia panel.
- Although the front passenger seat is not occupied, the seat belt warning light will blink or illuminate for 6 seconds.
- The front passenger's seat belt warning may operate when luggage is placed on the front passenger seat.



## Lap/shoulder belt Height adjustment

You can adjust the height of the shoulder belt anchor to one of 4 positions for maximum comfort and safety.

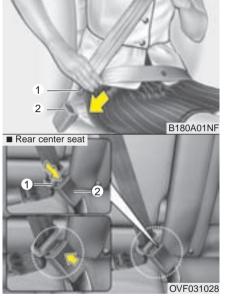
The height of the adjusting seat belt should not be too close to your neck. You will not be getting the most effective protection. The shoulder portion should be adjusted so that it lies across your chest and midway over your shoulder near the door and not your neck.

To adjust the height of the seat belt anchor, lower or raise the height adjuster into an appropriate position. To raise the height adjuster, pull it up (1). To lower it, push it down (3) while pressing the height adjuster button (2).

Release the button to lock the anchor into position. Try sliding the height adjuster to make sure that it has locked into position.

# A WARNING

- Verify the shoulder belt anchor is locked into position at the appropriate height. Never position the shoulder belt across your neck or face. Improperly positioned seat belts can cause serious injuries in an accident.
- Failure to replace seat belts after an accident could leave you with damaged seat belts that will not provide protection in the event of another collision leading to personal injury or death. Replace your seat belts after being in an accident as soon as possible.



To fasten your seat belt:

To fasten your seat belt, pull it out of the retractor and insert the metal tab (1) into the buckle (2). There will be an audible "click" when the tab locks into the buckle.



You should place the lap belt (1) portion across your hips and the shoulder belt (2) portion across your chest.

The seat belt automatically adjusts to the proper length only after the lap belt portion is adjusted manually so that it fits snugly around your hips. If you lean forward in a slow, easy motion, the belt will extend and let you move around. If there is a sudden stop or impact, however, the belt will lock into position. It will also lock if you try to lean forward too quickly.

# ! CAUTION

When using the rear center seat belt, the buckle with the "CENTER" mark must be used.

## **\* NOTICE**

If you are not able to pull out the seat belt from the retractor, firmly pull the belt out and release it. Then you will be able to pull the belt out smoothly.



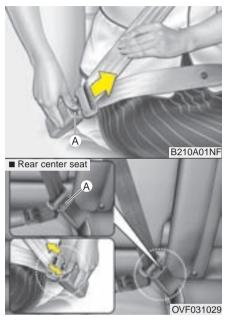
# A WARNING

You should place the lap belt portion as low as possible and snugly across your hips, not on your waist. If the lap belt is located too high on your waist, it may increase the chance of injury in the event of a collision. Both arms should not be under or over the belt. Rather, one should be over and the other under, as shown in the illustration. Never wear the seat belt under the arm near the door.

# 



Always have the plate (1) and the buckle (A) locked together. Make sure the belt is not twisted.



#### To release the seat belt:

The seat belt is released by pressing the release button (A) in the locking buckle. When it is released, the belt should automatically draw back into the retractor. If this does not happen, check the belt to be sure it is not twisted, then try again.



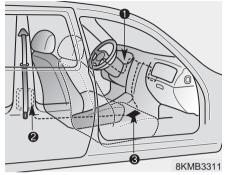
## Pre-tensioner seat belt

Your vehicle is equipped with driver's and front passenger's pre-tensioner seat belts. The purpose of the pre-tensioner is to make sure that the seat belts fit tightly against the occupant's body in certain frontal collisions. The pre-tensioner seat belts may be activated in crashes where the frontal collision is severe enough.

When the vehicle stops suddenly, or if the occupant tries to lean forward too quickly, the seat belt retractor will lock into position. In certain frontal collisions, the pre-tensioner will activate and pull the seat belt into tighter contact against the occupant's body. If the system senses excessive seat belt tension on the driver or passenger's seat belt when the pre-tensioner activates, the load limiter inside the pre-tensioner will release some of the pressure on the affected seat belt.

# 

For your safety, be sure that the belt webbing is not loose or twisted and always sit properly on your seat.



The seat belt pre-tensioner system consists mainly of the following components. Their locations are shown in the illustration:

- 1. SRS air bag warning light
- 2. Retractor pre-tensioner assembly
- 3. SRS control module

# A WARNING

To obtain maximum benefit from a pre-tensioner seat belt:

- 1. The seat belt must be worn correctly and adjusted to the proper position. Please read and follow all of the important information and precautions about your vehicle's occupant safety features – including seat belts and air bags – that are provided in this manual.
- 2. Be sure you and your passengers always wear seat belts properly.

# **\* NOTICE**

- When the pre-tensioner seat belts are activated, a loud noise may be heard and fine dust, which may appear to be smoke, may be visible in the passenger compartment. These are normal operating conditions and are not hazardous.
- Although it is harmless, the fine dust may cause skin irritation and should not be breathed for prolonged periods. Wash all exposed skin areas thoroughly after an accident in which the pretensioner seat belts were activated. (Continued)

(Continued)

• Because the sensor that activates the SRS air bag is connected with the pretensioner seat belt, the SRS air bag warning light on the instrument panel will illuminate for approximately 6 seconds after the ignition switch has been turned to the ON position, and then it should turn off.

# ! CAUTION

If the pre-tensioner seat belt is not working properly, this warning light will illuminate even if there is no malfunction of the SRS air bag.

If the SRS air bag warning light does not illuminate when the ignition switch is turned to ON, or if it remains illuminated after illuminating for approximately 6 seconds, or if it illuminates while the vehicle is being driven, we recommend that the system be inspected by an authorized HYUNDAI dealer.

## A WARNING

- Pre-tensioners are designed to operate only one time. After activation, pre-tensioner seat belts must be replaced. All seat belts, of any type, should always be replaced after they have been worn during a collision.
- The pre-tensioner seat belt assembly mechanisms become hot during activation. Do not touch the pre-tensioner seat belt assemblies for several minutes after they have been activated.
- Do not attempt to inspect or replace the pre-tensioner seat belts yourself. We recommend that the system be inspected by an authorized HYUNDAI dealer.
- Do not strike the pre-tensioner seat belt assemblies.
- Do not attempt to service or repair the pre-tensioner seat belt system in any manner.

(Continued)

## (Continued)

- Improper handling of the pre-tensioner seat belt assemblies, and failure to heed the warnings not to strike, modify, inspect, replace, service or repair the pre-tensioner seat belt assemblies may lead to improper operation or inadvertent activation and serious injury.
- Always wear the seat belts when driving or riding in a motor vehicle.
- If the vehicle or pre-tensioner seat belt must be discarded, we recommend that you contact an authorized HYUNDAI dealer.

## ! CAUTION

Body work on the front area of the vehicle may damage the pre-tensioner seat belt system. Therefore, we recommend that the system be serviced by an authorized HYUNDAI dealer.

### Seat belt precautions

# A WARNING

All occupants of the vehicle must wear their seat belts at all times. Seat belts and child restraints reduce the risk of serious or fatal injuries for all occupants in the event of a collision or sudden stop. Without a seat belt, occupants could be shifted too close to a deploying air bag, strike the interior structure or be thrown from the vehicle. Properly worn seat belts greatly reduce these hazards. Always follow the precautions

about seat belts, air bags and occupant seat contained in this manual.

#### Infant or small child

You should be aware of the specific requirements in your country. Child and/or infant seats must be properly placed and installed in the rear seat. For more information about the use of these restraints, refer to "Child restraint system" in this section.

## A WARNING

Every person in your vehicle needs to be properly restrained at all times, including infants and children. Never hold a child in your arms or lap when riding in a vehicle. The violent forces created during a crash will tear the child from your arms and throw the child against the interior. Always use a child restraint appropriate for your child's height and weight.

## **\* NOTICE**

Small children are best protected from injury in an accident when properly restrained in the rear seat by a child restraint system that meets the requirements of the Safety Standards of your country. Before buying any child restraint system, make sure that it has a label certifying that it meets Safety Standards of your country. The restraint must be appropriate for your child's height and weight. Check the label on the child restraint for this information. Refer to "Child restraint system" in this section.

### Larger children

Children who are too large for child restraint systems should always occupy the rear seat and use the available lap/shoulder belts. The lap portion should be fastened and snugged on the hips and as low as possible. Check if the belt fits periodically. A child's squirming could put the belt out of position. Children are afforded the most safety in the event of an accident when they are restrained by a proper restraint system in the rear seat. If a larger child (over age 12) must be seated in the front seat, the child should be securely restrained by the available lap/shoulder belt and the seat should be placed in the rearmost position. Children age 12 and under should be restrained securely in the rear seat. NEVER place a child age 12 and under in the front seat. NEVER place a rear facing child seat in the front seat of a vehicle.

If the shoulder belt portion slightly touches the child's neck or face, try placing the child closer to the center of the vehicle. If the shoulder belt still touches their face or neck they need to be returned to a child restraint system.

## WARNING - Shoulder belts on small children

- Never allow a shoulder belt to be in contact with a child's neck or face while the vehicle is in motion.
- If seat belts are not properly worn and adjusted on children, there is a risk of death or serious injury.

### Pregnant women

The use of a seat belt is recommended for pregnant women to lessen the chance of injury in an accident. When a seat belt is used, the lap belt portion should be placed as low and snugly as possible on the hips, not across the abdomen. For specific recommendations, consult a physician.

# A WARNING - Pregnant women

Pregnant women must never place the lap portion of the safety belt over the area of the abdomen where the fetus is located or above the abdomen where the belt could crush the fetus during an impact.

### Injured person

A seat belt should be used when an injured person is being transported. When this is necessary, you should consult a physician for recommendations.

### One person per belt

Two people (including children) should never attempt to use a single seat belt. This could increase the severity of injuries in case of an accident.

### Do not lie down

To reduce the chance of injuries in the event of an accident and to achieve maximum effectiveness of the restraint system, all passengers should be sitting up and the front seats should be in an upright position when the car is moving. A seat belt cannot provide proper protection if the person is lying down in the rear seat or if the front seat is in a reclined position.

## A WARNING

Riding with a reclined seatback increases your chance of serious or fatal injuries in the event of a collision or sudden stop. The protection of your restraint system (seat belts and air bags) is greatly reduced by reclining your seat. Seat belts must be snug against your hips and chest to work properly. The more the seatback is reclined, the greater the chance that an occupant's hips will slide under the lap belt causing serious internal injuries or the occupant's neck could strike the shoulder belt. Drivers and passengers should always sit well back in their seats. properly belted, and with the seatbacks upright.

### Care of seat belts

Seat belt systems should never be disassembled or modified. In addition, care should be taken to assure that seat belts and belt hardware are not damaged by seat hinges, doors or other abuse.

## A WARNING

When you return the rear seatback to its upright position after the rear seatback was folded down, be careful not to damage the seat belt webbing or buckle. Be sure that the webbing or buckle does not get caught or pinched in the rear seat. A seat belt with damaged webbing or buckle will not be as strong and could possibly fail during a collision or sudden stop, resulting in serious injury. If the webbing or buckles are damaged, get them replaced immediately.

### **Periodic inspection**

It is recommended that all seat belts be inspected periodically for wear or damage of any kind. Any damaged parts should be replaced as soon as possible.

### Keep belts clean and dry

Seat belts should be kept clean and dry. If belts become dirty, they can be cleaned by using a mild soap solution and warm water. Bleach, dye, strong detergents or abrasives should not be used because they may damage and weaken the fabric.

### When to replace seat belts

Entire in-use seat belt assembly or assemblies should be replaced if the vehicle has been involved in an accident. This should be done even if no damage is visible. If you have additional queations regarding seat belt operation, we recommend that you consult an authorized HYUNDAI dealer.

## CHILD RESTRAINT SYSTEM (IF EQUIPPED)

Children riding in the car should sit in the rear seat and must always be properly restrained to minimize the risk of injury in an accident, sudden stop or sudden maneuver. According to accident statistics, children are safer when properly restrained in the rear seats than in the front seat. Larger children not in a child restraint should use one of the seat belts provided.

You should be aware of the specific requirements in your country. Child and/or infant safety seats must be properly placed and installed in the rear seat. You must use a commercially available child restraint system that meets the requirements of the Safety Standards of your country. Child restraint systems are designed to be secured in vehicle seats by the lap belt portion of a lap/shoulder belt, or by a tether anchor and/or ISOFIX anchors.

Children could be injured or killed in a crash if their restraints are not properly secured. For small children and babies, a child seat or infant seat must be used. Before buying a particular child restraint system, make sure it fits your car seat and seat belts, and fits your child. Follow all the instructions provided by the manufacturer when installing the child restraint system.

# **A** WARNING

- A child restraint system must be placed in the rear seat. Never install a child or infant seat on the front passenger's seat. Should an accident occur and cause the passenger side air bag to deploy, it could severely injure or kill an infant or child seated in an infant or child seat. Thus only use a child restraint in the rear seat of your vehicle.
- A seat belt or child restraint system can become very hot if it is left in a closed vehicle on a sunny day, even if the outside temperature does not feel hot. Be sure to check the seat cover and buckles before placing a child there.
- When the child restraint system is not in use, store it in the luggage area or fasten it with a seat belt so that it will not be thrown forward in case of a sudden stop or an accident.
- Children may be seriously injured or killed by an inflating air bag. All children, even those too large for child restraints, must ride in the rear seat.

# A WARNING

To reduce the chance or serious or fatal injuries:

- Children of all ages are safer when restrained in the rear seat. A child riding in the front passenger seat can be forcefully struck by an inflating air bag resulting in serious or fatal injuries.
- Always follow the instructions for installation and use of the child restraint maker.
- Always make sure the child seat is secured properly in the car and your child is securely restrained in the child seat.
- Never hold a child in your arms or lap when riding in a vehicle. The violent forces created during a crash will tear the child from your arms and throw the child against the car's interior.
- Never put a seat belt over yourself and a child. During a crash, the belt could press deep into the child causing serious internal injuries.

(Continued)

## (Continued)

- Never leave children unattended in a vehicle – not even for a short time. The car can heat up very quickly, resulting in serious injuries to children inside. Even very young children may inadvertently cause the vehicle to move, entangle themselves in the windows, or lock themselves or others inside the vehicle.
- Never allow two children, or any two persons, to use the same seat belt.
- Children often squirm and reposition themselves improperly. Never let a child ride with the shoulder belt under their arm or behind their back. Always properly position and secure children in the rear seat.
- Never allow a child to stand-up or kneel on the seat or floorboard of a moving vehicle. During a collision or sudden stop, the child can be violently thrown against the vehicles interior, resulting in serious injury.

(Continued)

## (Continued)

- Never use an infant carrier or a child safety seat that "hooks" over a seatback, it may not provide adequate security in an accident.
- Seat belts can become very hot, especially when the car is parked in direct sunlight. Always check seat belt buckles before fastening them over a child.
- After an accident, we recommend that the system be checked by an authorized HYUNDAI dealer.
- If there is not enough space to place the child restraint system because of the driver's seat, install the child restraint system in the rear right seat.

Rearward-facing child restraint system



## Using a child restraint system

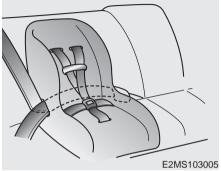
For small children and babies, the use of a child seat or infant seat is required. This child seat or infant seat should be of appropriate size for the child and should be installed in accordance with the manufacturer's instructions. For safety reasons, we recommend that the child restraint system be used in the rear seats.

## A WARNING

Never place a rear-facing child restraint in the front passenger seat, because of the danger that an inflating passenger-side air bag could impact the rear-facing child restraint and kill the child.

## A WARNING - Child seat installation

- A child can be seriously injured or killed in a collision if the child restraint is not properly anchored to the vehicle and the child is not properly restrained in the child restraint. Before installing the child restraint system, read the instructions supplied by the child restraint system manufacturer.
- If the seat belt does not operate as described in this section, we recommend that the system be checked by an authorized HYUNDAI dealer.
- Failure to observe this manual's instructions regarding child restraint system and the instructions provided with the child restraint system could increase the chance and/or severity of injury in an accident.
- If the vehicle headrest prevents proper installation of a child seat, the headrest of the respective seating position shall be readjusted or entirely removed.



Installing a child restraint system by lap/shoulder belt

To install a child restraint system on the outboard or center rear seats, do the following:

1. Place the child restraint system in the seat and route the lap/shoulder belt around or through the restraint, following the restraint manufacturer's instructions. Be sure the seat belt webbing is not twisted.



2. Fasten the lap/shoulder belt latch into the buckle. Listen for the distinct "click" sound.

Position the release button so that it is easy to access in case of an emergency.



3. Buckle the seat belt and allow the seat belt to take up any slack. After installation of the child restraint system, try to move it in all directions to be sure the child restraint system is securely installed.

If you need to tighten the belt, pull more webbing toward the retractor. When you unbuckle the seat belt and allow it to retract, the retractor will automatically revert back to its normal seated passenger emergency locking usage condition.

### Child Seat Restraint Suitability for Seat Position using the Seat Belt - For Europe

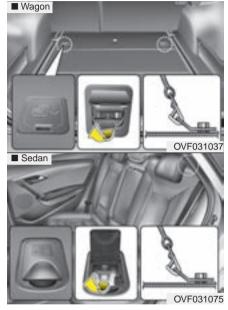
Use child safety seats that have been officially approved and are appropriate for your children. When using the child safety seats, refer to the following table.

Age Group	Seating Position				
Age Gloup	Front passenger	Rear outboard	Rear center		
0 : Up to 10 kg (0 - 9 months)	U	U	Х		
0+ : Up to 13 kg (0 - 2 years)	U	U	Х		
I : 9 kg to 18 kg (9 months - 4 years)	U	U	Х		
II & III : 15 kg to 36 kg (4 - 12 years)	U	U	Х		

# A WARNING

We recommend that a child restraint seat be installed in the rear seat, even if the front passenger's air bag ON/OFF switch is set to the OFF position. To ensure the safety of your child, the front passenger's air bag must be deactivated when it should be necessary to install a child restraint seat on the front passenger seat in exceptional circumstances.

U : Suitable for "universal" category restraints approved for use in this mass group



Securing a child restraint seat with "Tether Anchor" system (if equipped) Child restraint hook holders are located on the floor behind the rear seats (wagon) or the shelf behind the rear seats (sedan).



1. Route the child restraint seat strap over the seatback.

For vehicles with adjustable headrest, route the tether strap under the headrest and between the headrest posts, otherwise route the tether strap over the top of the seatback.

2. Connect the tether strap hook to the appropriate child restraint hook holder and tighten to secure the seat.

## A WARNING

A child can be seriously injured or killed in a collision if the child restraint is not properly anchored to the car and the child is not properly restrained in the child restraint. Always follow the child seat manufacturer's instructions for installation and use.

## A WARNING - Tether strap

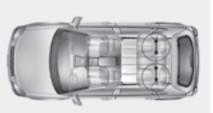
Never mount more than one child restraint to a single tether or to a single lower anchorage point. The increased load caused by multiple seats may cause the tethers or anchorage points to break, causing serious injury or death.

## A WARNING - Child restraint check

Check that the child restraint system is secure by pushing and pulling it in different directions. Incorrectly fitted child restraints may swing, twist, tip or separate causing death or serious injury.

## A WARNING

- Child restraint anchorage
- Child restraint anchorages are designed to withstand only those loads imposed by correctly fitted child restraints. Under no circumstances are they to be used for adult seat belts or harnesses or for attaching other items or equipment to the vehicle.
- The tether strap may not work properly if attached somewhere other than the correct tether anchor.



Securing a child restraint system

with "ISOFIX" system and "Tether

Anchorage" system (if equipped)

ISOFIX is a standardised method of fit-

ting child seats that eliminates the need

to use the standard adult seat belt to

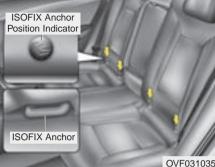
secure the seat in the vehicle. This

enables a much more secure and posi-

tive location with the added benefit of

An ISOFIX-seat may only be installed if it

easier and guicker installation.



There are ISOFIX symbols located on the lower portion of each side of the rear seatbacks. These symbols indicate the position of the lower anchors for child restraints so equipped.

OI M039035

has vehicle-specific or universal approval in accordance with the requirements of ECE-R 44.

\* ISOFIX: International Standards Origanisation FIX



CRS with universal approval to ECE-R 44 need to be fixed additionally with a top tether strap connected to the corresponding top tether anchorage point on the floor behind the rear seats (wagon) or the shelf behind the rear seats (sedan). The installing and the use of a child-seat

has to be done according to the installing-manual, which is added to the ISOFIX-seat.

## A WARNING

- When using vehicle's the "ISOFIX" system to install a child restraint system in the rear seat, all unused vehicle rear seat belt metal latch plates or tabs must be latched securely in their seat belt buckles and the seat belt webbing must be retracted behind the child restraint to prevent the child from reaching and taking hold of unretracted seat belts. Unlatched metal latch plates or tabs may allow the child to reach the unretracted seat belts which may result in strangulation and a serious injury or death to the child in the child restraint.
- Do not place anything around the ISOFIX anchors. Also make sure that the seat belt is not caught in the ISOFIX anchors.

Both rear outboard seats are equipped with a pair of ISOFIX anchorages as well as a corresponding top tether anchorage on the floor behind the rear seats (wagon) or the shelf behind the rear seats (sedan). The ISOFIX anchorages are located between seat cushion and backrest, marked with the ISOFIX icon. For installation, CRS ISOFIX connecters have to engage with the vehicles ISOFIX anchorages (listen for a CLICK, check potential visual indicators on the CRS and cross-check by pulling).

### To secure the child restraint seat

 To engage the child restraint seat to the ISOFIX anchor, insert the child restraint seat latch into the ISOFIX anchor. Listen for the audible "click" sound.

# ! CAUTION

Do not allow the rear seat belt webbing to get scratched or pinched by the ISOFIX-seat latch and ISOFIX anchor during installation.

2. Connect the tether strap hook to the child restraint hook holder and tighten to secure the seat. (Refer to the previous page.)

## A WARNING

• Do not install a child restraint seat at the center of the rear seat using the vehicle's ISOFIX anchors. The ISOFIX anchors are only provided for the left and right outboard rear seating positions. Do not misuse the ISOFIX anchors by attempting to attach a child restraint seat in the middle of the rear seat to the ISOFIX anchors.

In a crash, the child restraint seat ISOFIX attachments may not be strong enough to secure the child restraint seat properly in the center of the rear seat and may break, causing serious injury or death.

• Do not mount more than one child restraint to a child restraint lower anchorage point. The improper increased load may cause the anchorage points or tether anchor to break, causing serious injury or death.

(Continued)

## (Continued)

- Attach the ISOFIX or ISOFIX-compatible child restraint seat only to the appropriate locations shown in the illustration.
- Always follow the installation and use instructions provided by the manufacturer of the child restraint.

Mass Group Size Class			Vehicle ISOFIX positions			
	Size Class	Fixture	Front Passenger	Rear Outboard (Driver side)	Rear Outboard (Passenger side)	Rear Center
Carrycot	F	ISO/L1	-	Х	Х	-
	G	ISO/L2	-	Х	Х	-
0 : UP to 10kg	E	ISO/R1	-	IL	IL	-
0+ : UP to 13kg	E	ISO/R1	-	IL	IL	-
	D	ISO/R2	-	IL	IL	-
	С	ISO/R3	-	IL	IL	-
I : 9 to 18kg	D	ISO/R2	-	IL	IL	-
	С	ISO/R3	-	IL	IL	-
	В	ISO/F2	-	IUF	IUF	-
	B1	ISO/F2X	-	IUF	IUF	-
	А	ISO/F3	-	IUF	IUF	-

### Child seat restraint suitability for vehicle ISOFIX positions - For Europe

- IUF = Suitable for ISOFIX forward child restraints systems of universal category approved for use in the mass group.
- IL = Suitable for particular ISOFIX child restraints systems (CRS) approved for this vehicle type according to ECE44. These ISOFIX CRS are those of the "specific vehicle", "restricted" or "semi-universal" categories.
- X = ISOFIX position not suitable for ISOFIX child restraint system in this mass group and/or this size class.
- \* Both ISO/R2 and ISO/R3 are able to be set up only at the foremost position of the passenger seat.
- \* ISOFIX child restraint system size classes and fixtures

- A ISO/F3: Full-Height Forward-Facing toddler CRS (height 720mm)
- B ISO/F2: Reduced-Height Forward-Facing toddler CRS (height 650mm)
- B1 ISO/F2X: Reduced-Height Second Version Back Surface Shape Forward-Facing toddler CRS (height 650mm)
- C ISO/R3: Full-Size Rearward-Facing toddler CRS
- D ISO/R2: Reduced-Size Rearward-Facing toddler CRS
- E ISO/R1: Infant-Size Rearward-Facing CRS
- F ISO/L1: Left Lateral Facing position CRS (carry-cot)
- G ISO/L2: Right Lateral Facing position CRS (carry-cot)

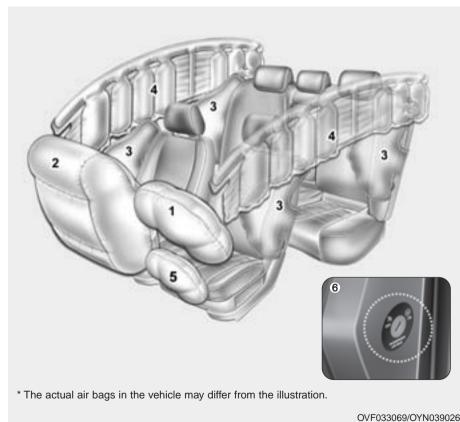
## Recommended child restraint systems – For Europe

Mass Group	Name	Manufacturer	Type of Fixation	ECE-R44 Approval No.
Group 0-1 (0-18kg)	BIMBO G0/1 S	FAIR	Rearward facing with vehicle specific ISOFIX platform type "G"	E4 03443416 (Seat) E4 04443718 (Platform)
	Baby Safe Plus II	Britax Römer	Rearward facing with ISOFIX adapter	E1 04301146
Group 1 (9-18kg)	Duo Plus	Britax Römer	Forward facing with vehicle ISOFIX lower anchorage + Top Tether	E1 04301133

CRS Manufacturer information

FAIRhttp://www.fairbimbofix.comBritax Römerhttp://www.britax.com

# AIR BAG - SUPPLEMENTAL RESTRAINT SYSTEM (IF EQUIPPED)



- (1) Driver's front air bag
- (2) Passenger's front air bag\*
- (3) Side impact air bag\*
- (4) Curtain air bag\*
- (5) Driver's knee air bag\*
- (6) Passenger's front air bag ON/OFF switch\*
- \* : if equipped

# A WARNING

- Even in vehicles with air bags, you and your passengers must always wear the safety belts provided in order to minimize the risk and severity of injury in the event of a collision or rollover.
- SRS and pretensioners contain explosive chemicals.
  - If scraping a vehicle without removing SRS and pretensioners from a vehicle, it may cause fire. Before scraping a vehicle, we recommend that you contact an authorized HYUNDAI dealer.
- Keep the SRS parts and wirings away from water or any liquid. If the SRS components are inoperative due to exposure to water or liquids, it may cause fire or severe injury.

# How does the air bag system operate

- Air bags are activated (able to inflate if necessary) only when the ignition switch is turned to the ON or START position.
- Air bags inflate instantly in the event of serious frontal or side collision (if equipped with side impact air bag or curtain air bag) in order to help protect the occupants from serious physical injury.
- There is no single speed at which the air bags will inflate.

Generally, air bags are designed to inflate based upon the severity of a collision and its direction. These two factors determine whether the sensors produce an electronic deployment/ inflation signal.

- Air bag deployment depends on a number of factors including vehicle speed, angles of impact and the density and stiffness of the vehicles or objects which your vehicle hits in the collision. The determining, factors are not limited to those mentioned above.
- The front air bags will completely inflate and deflate in an instant. It is virtually impossible for you to see the air bags inflate during an accident. It is much more likely that you will simply see the deflated air bags hanging out of their storage compartments after the collision.
- In order to help provide protection in a severe collision, the air bags must inflate rapidly. The speed of air bag inflation is a consequence of extremely short time in which a collision occurs and the need to get the air bag between the occupant and the vehicle structures before the occupant impacts those structures. This speed of inflation reduces the risk of serious or life-threatening injuries in a severe collision and is thus a necessary part of air bag design. However, air bag inflation can also cause injuries which can include facial abrasions, bruises and broken bones because the inflation speed also causes the air bags to expand with a great deal of force.

• There are even circumstances under which contact with the steering wheel air bag can cause fatal injuries, especially if the occupant is positioned excessively close to the steering wheel.

# A WARNING

- To avoid severe personal injury or death caused by deploying air bags in a collision, the driver should sit as far back from the steering wheel air bag as possible (at least 250 mm (10 inches) away). The front passenger should always move their seat as far back as possible and sit back in their seat.
- Air bag inflates instantly in an event of a collision, passengers may be injured by the air bag expansion force if they are not in a proper position.
- Air bag inflation may cause injuries including facial or bodily abrasions, injuries from broken glasses or burns.

#### Noise and smoke

When the air bags inflate, they make a loud noise and they leave smoke and powder in the air inside of the vehicle. This is normal and is a result of the ignition of the air bag inflator. After the air bag inflates, you may feel substantial discomfort in breathing due to the contact of your chest with both the seat belt and the air bag, as well as from breathing the smoke and powder. **Open your doors and/or windows as soon as possible after impact in order to reduce discomfort and prevent prolonged exposure to the smoke and powder.** 

Though smoke and powder are nontoxic, it may cause irritation to the skin (eyes, nose and throat, etc.). If this is the case, wash and rinse with cold water immediately and consult the doctor if the symptom persists.

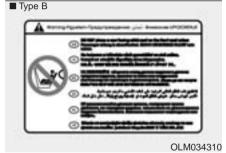
## A WARNING

When the air bags deploy, the air bag related parts in the steering wheel and/or instrument panel and/or in both sides of the roof rails above the front and rear doors are very hot. To prevent injury, do not touch the air bag storage areas internal components immediately after an air bag has inflated.

#### ■ Туре А



#### OYDESA2042



# Do not install a child restraint on the front passenger seat

Never place a rear-facing child restraint in the front passenger's seat. If the air bag deploys, it would impact the rear-facing child restraint, causing serious or fatal injury. In addition, do not place front-facing child restraints in the front passenger's seat either. If the front passenger air bag inflates, it would cause serious or fatal injuries to the child.

If your vehicle is equipped with the passenger's front air bag ON/OFF switch, you can activate or deactivate the front passenger's air bag when necessary. For more details, please refer to 3-45 page.

## A WARNING

- NEVER use a rearward facing child restraint on a seat protected by an ACTIVE AIRBAG in front of it, DEATH or SERIOUS INJURY to the CHILD can occur.
- Never put a child restraint in the front passenger's seat. If the front passenger air bag inflates, it would cause serious or fatal injuries.
- When children are seated in the rear outboard seats of vehicle equipped with side and/or curtain air bags, be sure to install the child restraint system as far away from the door side as possible, and securely lock the child restraint system in position.
   Inflation of side and/or curtain air bags could cause serious injury or death to an infant or child.



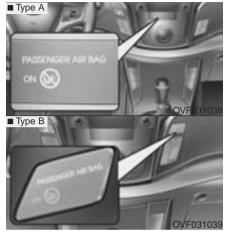
#### W7-147

## Air bag warning and indicator

### Air bag warning light

The purpose of the air bag warning light in your instrument panel is to alert you of a potential problem with your air bag -Supplemental Restraint System (SRS). When the ignition switch is turned ON, the warning light should illuminate for approximately 6 seconds, then go off. Have the system checked if:

- The light does not turn on briefly when you turn the ignition ON.
- The light stays on after illuminating for approximately 6 seconds.
- The light comes on while the vehicle is in motion.
- The light blinks when the ignition switch is in ON position.



Passenger's front air bag ON indicator (if equipped)



Type A

Type B

The passenger's front air bag ON indicator illuminates for approximately 4 seconds after the ignition switch is turned to the ON position.

The passenger's front air bag ON indicator also comes on when the passenger's front air bag ON/OFF switch is set to the ON position and goes off after approximately 60 seconds. The passenger's front air bag OFF indicator illuminates for about 4 seconds after the ignition switch is turned to the ON position.

Passenger's front air bag

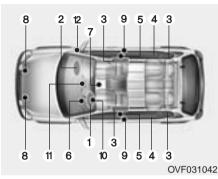
OFF indicator (if equipped)

The passenger's front air bag OFF indicator also comes on when the passenger's front air bag ON/OFF switch is set to the OFF position and goes off when the passenger's front air bag ON/OFF switch is set to the ON position.

## ! CAUTION

If the passenger's front air bag ON/OFF switch malfunctions, the passenger's front air bag OFF indicator will not illuminate (The passenger's front air bag ON indicator comes on and goes off after approximately 60 seconds) and the passenger's front air bag will inflate in a frontal impact even if the passenger's front air bag ON/OFF switch is set to the OFF position.

If this occurs, we recommend that the passenger's front air bag ON/OFF switch and the SRS air bag system be inspected by an authorized HYUNDAI dealer.



### SRS components and functions

The SRS consists of the following components:

- 1. Driver's front air bag module
- 2. Passenger's front air bag module\*
- 3. Side air bag modules\*
- 4. Curtain air bag modules\*
- 5. Retractor pre-tensioner assemblies
- 6. Air bag warning light
- 7. SRS control module (SRSCM)
- 8. Front impact sensors\*
- 9. Side impact sensors\*
- 10. Driver's knee air bag module\*
- 11. Passenger's front air bag ON/OFF indicator\*

- 12. Passenger's front air bag ON/OFF switch\*
- \* : if equipped

The SRSCM continually monitors all elements while the ignition switch is ON to determine if a frontal, near-frontal impact or side impact is severe enough to require air bag deployment or pre-tensioner seat belt deployment.

The SRS air bag warning light on the instrument panel will illuminate for about 6 seconds after the ignition switch is turned to the ON position, after which the air bag warning light should go out.

# **A** WARNING

If any of the following conditions occurs, this indicates a malfunction of the SRS. We recommend that the system be inspected by an authorized HYUNDAI dealer.

- The light does not turn on briefly when you turn the ignition ON.
- The light stays on after illuminating for approximately 6 seconds.
- The light comes on while the vehicle is in motion.
- The light blinks when the ignition switch is in ON position.

3 46



The front air bag modules are located both in the center of the steering wheel, in the front passenger's panel above the glove box and/or in the driver's side knee bolster. When the SRSCM detects a sufficiently severe impact to the front of the vehicle, it will automatically deploy the front air bags.



Upon deployment, tear seams molded directly into the pad covers will separate under pressure from the expansion of the air bags. Further opening of the covers then allows full inflation of the air bags.



A fully inflated air bag, in combination with a properly worn seat belt, slows the driver's or the passenger's forward motion, reducing the risk of head and chest injury.

After complete inflation, the air bag immediately starts deflating, enabling the driver to maintain forward visibility and the ability to steer or operate other controls. Passenger's front air bag



# A WARNING

- Do not install or place any accessories (drink holder, cassette holder, sticker, etc.) on the front passenger's panel above the glove box in a vehicle with a passenger's air bag. Such objects may become dangerous projectiles and cause injury if the passenger's air bag inflates.
- When installing a container of liquid air freshener inside the vehicle, do not place it near the instrument cluster nor on the instrument panel surface.

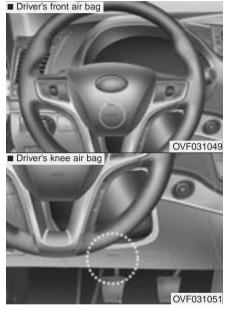
It may become dangerous projectiles and cause injury if the passenger's air bag inflates.

### 

 If an air bag deploys, there may be a loud noise followed by a fine dust released in the vehicle. These conditions are normal and are not hazardous - the air bags are packed in this fine powder. The dust generated during air bag deployment may cause skin or eye irritation as well as aggravate asthma for some persons. Always wash all exposed skin areas thoroughly with cold water and a mild soap after an accident in which the air bags were deployed.

(Continued)

- The SRS can function only when the ignition key is in the ON position. If the SRS air bag warning light does not illuminate, or continuously remains on after illuminating for about 6 seconds when the ignition key is turned to the ON position, or after the engine is started, comes on while driving, the SRS is not working properly. If this occurs, we recommen that the system be inspected by an authorized HYUNDAI dealer.
- Before you replace a fuse or disconnect a battery terminal, turn the ignition switch to the LOCK position and remove the ignition key. Never remove or replace the air bag related fuse(s) when the ignition switch is in the ON position. Failure to heed this warning will cause the SRS air bag warning light to illuminate.



# Driver's and passenger's front air bag (if equipped)

Your vehicle is equipped with a Supplemental Restraint (Air Bag) System and lap/shoulder belts at both the driver and passenger seating positions.

The indications of the system's presence are the letters "AIR BAG" embossed on the air bag pad cover in the steering wheel and/or on the cover of the driver's side knee bolster located below the steering wheel and the passenger's side front panel pad above the glove box.

The SRS consists of air bags installed under the pad covers in the center of the steering wheel, in the knee bolster below the steering wheel column and the passenger's side front panel above the glove box.



The purpose of the SRS is to provide the vehicle's driver and/or the front passenger with additional protection than that offered by the seat belt system alone in case of a frontal impact of sufficient severity.

# A WARNING

Always use seat belts and child restraints – every trip, every time, everyone! Air bags inflate with considerable force and in the blink of an eye. Seat belts help keep occupants in proper position to obtain maximum benefit from the air bag. Even with air bags, improperly and unbelted occupants can be severely injured when the air bag inflates. Always follow the precautions about seat belts, air bags and occupant safety contained in this manual.

To reduce the chance of serious or fatal injuries and receive the maximum safety benefit from your restraint system:

- Never place a child in any child or booster seat in the front seat.
- ABC Always Buckle Children in the back seat. It is the safest place for children of any age to ride.
- Front and side impact air bags can injure occupants improperly positioned in the front seats.

(Continued)

#### (Continued)

- Move your seat as far back as practical from the front air bags, while still maintaining control of the vehicle.
- You and your passengers should never sit or lean unnecessarily close to the air bags. Improperly positioned drivers and passengers can be severely injured by inflating air bags.
- Never lean against the door or center console always sit in an upright position.
- No objects (such as crash pad cover, cellular phone holder, cup holder, perfume or stickers) should be placed over or near the air bag modules on the steering wheel, instrument panel, windshield glass, and the front passenger's panel above the glove box. Such objects could cause harm if the vehicle is in a crash severe enough to cause the air bags to deploy.
- Do not attach any objects on front windshield and inside mirror.

(Continued)

#### (Continued)

- Do not tamper with or disconnect SRS wiring or other components of the SRS system. Doing so could result in injury, due to accidental deployment of the air bags or by rendering the SRS inoperative.
- If the SRS air bag warning light remains illuminated while the vehicle is being driven, we recommend that the system be inspected by an authorized HYUNDAI dealer.
- Air bags can only be used once we recommend that the system be replaced by an authorized HYUNDAI dealer.
- The SRS is designed to deploy the front air bags only when an impact is sufficiently severe and when the impact angle is less than 30° from the forward longitudinal axis of the vehicle.

#### (Continued)

Additionally, the air bags will only deploy once. Seat belts must be worn at all times.

- Front air bags are not intended to deploy in side-impact, rearimpact or rollover crashes. In addition, front air bags will not deploy in frontal crashes below the deployment threshold.
- A child restraint system must never be placed in the front seat. The infant or child could be severely injured or killed by an air bag deployment in case of an accident.
- Children age 12 and under must always be properly restrained in the rear seat. Never allow children to ride in the front passenger seat. If a child over 12 must be seated in the front seat, he or she must be properly belted and the seat should be moved as far back as possible.

(Continued)

#### (Continued)

- For maximum safety protection in all types of crashes, all occupants including the driver should always wear their seat belts whether or not an air bag is also provided at their seating position to minimize the risk of severe injury or death in the event of a crash. Do not sit or lean unnecessarily close to the air bag while the vehicle is in motion.
- Sitting improperly or out of position can result in serious or fatal injury in a crash. All occupants should sit upright with the seat back in an upright position, centered on the seat cushion with their seat belt on, legs comfortably extended and their feet on the floor until the vehicle is parked and the ignition key is removed.
- The SRS air bag system must deploy very rapidly to provide protection in a crash. If an occupant is out of position because of not wearing a seat belt, the air bag may forcefully contact the occupant causing serious or fatal injuries.



Passenger's front air bag ON/OFF switch (if equipped)

The passenger's front air bag can be deactivated by the passenger's front air bag ON/OFF switch if a child restraint is installed on the front passenger's seat or if the front passenger's seat is unoccupied by a person.

To ensure the safety of your child, the passenger's front air bag must be deactivated when it should be necessary to install a rearward facing child seat on the front passenger seat in exceptional circumstances.



To deactivate or reactivate the passenger's front air bag:

To deactivate the passenger's front air bag, insert the master key into the passenger's front air bag ON/OFF switch and turn it to the OFF position.

The passenger's front air bag OFF indicator ( $\aleph_2$ ) will illuminate and stay on until the passenger's front air bag is reactivated.

To reactivate the passenger's front air bag, insert the master key into the passenger's front air bag ON/OFF switch and turn it to the ON position. The passenger's front air bag OFF indicator will go out and the passenger's front air bag ON indicator () will illuminate for approximately 60 seconds.

# A WARNING

On some models, the front air bag ON/OFF switch could turn by using a similar small rigid device. Always check the status of the front air bag ON/OFF switch and passenger's front air bag ON/OFF indicator.

# **\* NOTICE**

- When the passenger's front air bag ON/OFF switch is set to the ON position, the passenger's front air bag is activated and child or infant seat should not be installed on the front passenger seat.
- When the passenger's front air bag ON/OFF switch is set to the OFF position, the passenger's front air bag is deactivated.

# ! CAUTION

 If the passenger's front air bag ON/OFF switch is not working properly, the air bag warning light (\*)on the instrument panel will illuminate.

And, the passenger's front air bag OFF indicator (※) will not illuminate (The passenger's front air bag ON indicator comes on and goes off after approximately 60 seconds), the SRS Control Module reactivates the passenger's front air bag and the passenger's front air bag will inflate in frontal impact crashes even if the passenger's front air bag ON/OFF switch is set to the OFF position.

#### (Continued)

If this occurs, we recommend that the system be inspected by an authorized HYUNDAI dealer.

• If the SRS air bag warning light blinks or does not illuminate when the ignition switch is turned to the ON position, or if it illuminates while the vehicle is being driven, we recommend that the system be inspected by an authorized HYUNDAI dealer.

### 

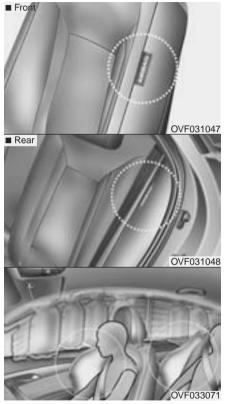
- The driver is responsible for the proper position of the passenger's front air bag ON/OFF switch.
- Deactivate the passenger's front air bag only when the ignition switch is switched off, or the malfunction may occur in the SRS Control Module.

And there may be a danger that the driver's and/or front passenger's and/or side and curtain air bag may fail to trigger, or not trigger correctly during a collision.

 Never install a rearward facing child seat on the front passenger's seat unless the passenger's front air bag has been deactivated. The infant or child could be severely injured or killed by an air bag deployment in case of an accident.

(Continued)

- Even though your vehicle is equipped with the passenger's front air bag ON/OFF switch, do not install a child restraint system in the front passenger's seat. A child restraint system must never be placed in the front seat. Children who are too large for child restraint systems should always occupy the rear seat and use the available lap/shoulder belts. Children are afforded the most safety in the event of an accident when thev are restrained by a proper restraint system in the rear seat.
- As soon as the child seat is no longer needed on the front passenger's seat, reactivate the front passenger's air bag.



Side impact air bag (if equipped)

Your vehicle is equipped with a side impact air bag in each front and outboard rear seat. The purpose of the air bag is to provide the vehicle's driver and/or the front passenger with additional protection than that offered by the seat belt alone.

The side impact air bags are designed to deploy only during certain side-impact collisions, depending on the crash severity, angle, speed and point of impact. The side air bags are not designed to deploy in all side impact situations.

# **A** WARNING

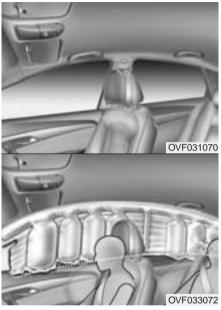
Do not allow the passengers to lean their heads or bodies onto doors, put their arms on the doors, stretch their arms out of the window, or place objects between the doors and passengers when they are seated on seats equipped with side and/or curtain air bags.

# A WARNING

- The side impact air bag is supplemental to the driver's and the passenger's seat belt systems and is not a substitute for them. Therefore your seat belts must be worn at all times while the vehicle is in motion. The air bags deploy only in certain side impact conditions severe enough to cause significant injury to the vehicle occupants.
- For best protection from the side impact air bag system and to avoid being injured by the deploying side impact air bag, both front seat occupants should sit in an upright position with the seat belt properly fastened. The driver's hands should be placed on the steering wheel at the 9:00 and 3:00 positions. The passenger's arms and hands should be placed on their laps.
- Do not use any accessory seat covers.
- Use of seat covers could reduce or prevent the effectiveness of the system.
- Do not install any accessories on the side or near the side impact air bag.

#### (Continued)

- Do not place any objects over the air bag or between the air bag and yourself. Also, do not attach any objects around the area the air bag inflates such as the door, side door glass, front and rear pillar.
- Do not put any objects between the side air bag label and seat cushion. It could cause harm if the vehicle is in a crash severe enough to cause the air bags to deploy.
- Do not place any objects (an umbrella, bag, etc.) between the front door and the front seat. Such objects may become dangerous projectiles and cause injury if the supplemental side impact air bag inflates.
- To prevent unexpected deployment of the side impact air bag that may result in personal injury, avoid impact to the side impact sensor when the ignition key is on.
- If the seat or seat cover is damaged, we recommend that the system be serviced by an authorized HYUNDAI dealer.Inform that your vehicle is equipped with side impact air bags.



Curtain air bag (if equipped)

Curtain air bags are located along both sides of the roof rails above the front and rear doors.

They are designed to help protect the heads of the front seat occupants and the rear outboard seat occupants in certain side impact collisions. The curtain air bags are designed to deploy during certain side impact collisions, depending on the crash severity, angle, speed and point of impact.

The curtain air bags are not designed to deploy in all side impact situations, collisions from the front or rear of the vehicle or in most rollover situations.

# A WARNING

 In order for side impact and curtain air bags to provide the best protection, both front seat occupants and both outboard rear occupants should sit in an upright position with the seat belts properly fastened.

Importantly, children should sit in a proper child restraint system in the rear seat.

• When children are seated in the rear outboard seats, they must be seated in the proper child restraint system.

Make sure to put the child restraint system as far away from the door side as possible, and secure the child restraint system in a locked position.

• Do not place any objects over the air bag. Also, do not attach any objects around the area the air bag inflates such as the door, side door glass, front and rear pillar, roof side rail.

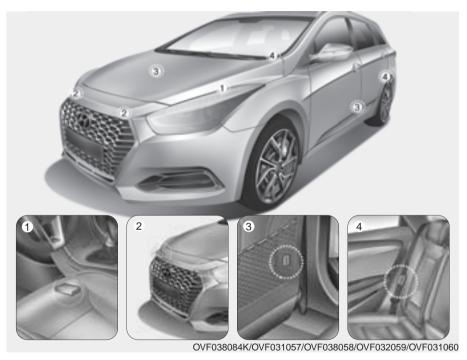
(Continued)

#### (Continued)

- Do not hang other objects except clothes, especially hard or breakable objects. In an accident, it may cause vehicle damage or personal injury.
- Do not allow the passengers to lean their heads or bodies onto doors, put their arms on the doors, stretch their arms out of the window, or place objects between the doors and passengers when they are seated on seats equipped with side and/or curtain air bags.
- Never try to open or repair any components of the side curtain air bag system. We recommend that the system be serviced by an authorized HYUNDAI dealer.

Failure to follow the above mentioned instructions can result in injury or death to the vehicle occupants in an accident. Why didn't my air bag go off in a collision? (Inflation and non-inflation conditions of the air bag)

There are many types of accidents in which the air bag would not be expected to provide additional protection. These include rear impacts, second or third collisions in multiple impact accidents, as well as low speed impacts.



Air bag collision sensors

- (1) SRS control module
- (2) Front impact sensor
- (3) Side impact sensor (front)\*
- (4) Side impact sensor (rear)\*
- \* : if equipped

# A WARNING

• Do not hit or allow any objects to impact the locations where air bag or sensors are installed.

This may cause unexpected air bag deployment, which could result in serious personal injury or death.

 If the installation location or angle of the sensors is altered in any way, the air bags may deploy when they should not or they may not deploy when they should, causing severe injury or death.

Therefore, do not try to perform maintenance on or around the air bag sensors. We recommend that the system be serviced by an authorized HYUNDAI dealer.

(Continued)

#### (Continued)

- Problems may arise if the sensor installation angles are changed due to the deformation of the front bumper, body or B pillar and C pillars where side collision sensors are installed. We recommend that the system be serviced by an authorized HYUNDAI dealer.
- Your vehicle has been designed to absorb impact and deploy the air bag(s) in certain collisions. Installing bumper guards or replacing a bumper with non-genuine parts may adversely affect your vehicles collision and air bag deployment performance.



Air bag inflation conditions Front air bags

Front air bags are designed to inflate in a frontal collision depending on the intensity, speed or angles of impact of the front collision.



Side impact and curtain air bags (if equipped)

Side impact and/or curtain air bags are designed to inflate when an impact is detected by side collision sensors depending on the strength, speed or angles of impact resulting from a side impact collision. Although the front air bags (driver's and front passenger's air bags) are designed to inflate only in frontal collisions, they also may inflate in other types of collisions if the front impact sensors detect a sufficient impact. Side air bags (side impact and/or curtain air bags) are designed to inflate only in side impact collisions, but they may inflate in other collisions if the side impact sensors detect a sufficient impact.

If the vehicle chassis is impacted by bumps or objects on unimproved roads or sidewalks, air bags may deploy. Drive carefully on unimproved roads or on surfaces not designed for vehicle traffic to prevent unintended air bag deployment.



Air bag non-inflation conditions

 In certain low-speed collisions the air bags may not deploy. The air bags are designed not to deploy in such cases because they may not provide benefits beyond the protection of the seat belts in such collisions.



 Air bags are not designed to inflate in rear collisions, because occupants are moved backward by the force of the impact. In this case, inflated air bags would not be able to provide any additional benefit.



- Front air bags may not inflate in side impact collisions, because occupants move to the direction of the collision, and thus in side impacts, frontal air bag deployment would not provide additional occupant protection.
- However, if equipped with side impact and curtain air bags, the air bags may inflate depending on the intensity, vehicle speed and angles of impact.



 In an angled collision, the force of impact may direct the occupants in a direction where the air bags would not be able to provide any additional benefit, and thus the sensors may not deploy any air bags.



· Just before impact, drivers often brake heavily. Such heavy braking lowers the front portion of the vehicle causing it to "ride" under a vehicle with a higher ground clearance. Air bags may not inflate in this "under-ride" situation because deceleration forces that are detected by sensors may be significantly replaced by such "under-ride" collisions.



OED036104

· Air bags may not inflate in rollover accidents because air bag deployment would not provide protection to the occupants.

However, side and/or curtain air bags may inflate when the vehicle is rolled over by a side impact collision, if the vehicle is equipped with side impact air bags and curtain air bags.



· Air bags may not inflate if the vehicle collides with objects such as utility poles or trees, where the point of impact is concentrated to one area and the full force of the impact is not delivered to the sensors.

### SRS Care

The SRS is virtually maintenance-free and so there are no parts you can safely service by yourself. If the SRS air bag warning light does not illuminate or if it continuously remains on, we recommend that the system be inspected by an authorized HYUNDAI dealer.

We recommend that the any work on the SRS system, such as removing, installing, repairing, or any work on the steering wheel be performed by an authorized HYUNDAI dealer.

Improper handling of the SRS system may result in serious personal injury.

# A WARNING

- Modification to SRS components or wiring, including the addition of any kind of badges to the pad covers or modifications to the body structure, can adversely affect SRS performance and lead to possible injury.
- For cleaning the air bag pad covers, use only a soft, dry cloth or one which has been moistened with plain water. Solvents or cleaners could adversely affect the air bag covers and proper deployment of the system.
- No objects should be placed over or near the air bag modules on the steering wheel, instrument panel, and the front passenger's panel above the glove box, because any such object could cause harm if the vehicle is in a crash severe enough to cause the air bags to inflate.

(Continued)

- If the air bags inflate, we recommend that the system be replaced by an authorized HYUNDAI dealer.
- Do not tamper with or disconnect SRS wiring, or other components of the SRS system. Doing so could result in injury, due to accidental inflation of the air bags or by rendering the SRS inoperative.
- If components of the air bag system must be discarded, or if the vehicle must be scrapped, certain safety precautions must be observed. An authorized HYUNDAI dealer knows these precautions and can give you the necessary information. Failure to follow these precautions and procedures could increase the risk of personal injury.
- If your car was flooded and has soaked carpeting or water on the flooring, you shouldn't try to start the engine; we recommend that you contact an authorized HYUNDAI dealer.

### Additional safety precautions

- Never let passengers ride in the cargo area or on top of a foldeddown back seat. All occupants should sit upright, fully back in their seats with their seat belts on and their feet on the floor.
- Passengers should not move out of or change seats while the vehicle is moving. A passenger who is not wearing a seat belt during a crash or emergency stop can be thrown against the inside of the vehicle, against other occupants, or out of the vehicle.
- Each seat belt is designed to restrain one occupant. If more than one person uses the same seat belt, they could be seriously injured or killed in a collision.
- Do not use any accessories on seat belts. Devices claiming to improve occupant comfort or reposition the seat belt can reduce the protection provided by the seat belt and increase the chance of serious injury in a crash.
- Passengers should not place hard or sharp objects between themselves and the air bags. Carrying hard or sharp objects on your lap or in your mouth can result in injuries if an air bag inflates.

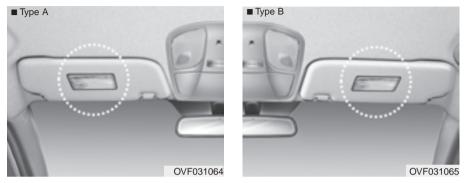
- Keep occupants away from the air bag covers. All occupants should sit upright, fully back in their seats with their seat belts on and their feet on the floor. If occupants are too close to the air bag covers, they could be injured if the air bags inflate.
- Do not attach or place objects on or near the air bag covers. Any object attached to or placed on the front or side impact air bag covers could interfere with the proper operation of the air bags.
- Do not modify the front seats. Modification of the front seats could interfere with the operation of the supplemental restraint system sensing components or side air bags.
- Do not place items under the front seats. Placing items under the front seats could interfere with the operation of the supplemental restraint system sensing components and wiring harnesses.
- Never hold an infant or child on your lap. The infant or child could be seriously injured or killed in the event of a crash. All infants and children should be properly restrained in appropriate child safety seats or seat belts in the rear seat.

# A WARNING

- Sitting improperly or out of position can cause occupants to be shifted too close to a deploying air bag, strike the interior structure or be thrown from the vehicle resulting in serious injury or death.
- Always sit upright with the seatback in an upright position, centered on the seat cushion with your seat belt on, legs comfortably extended and your feet on the floor.

#### Adding equipment to or modifying your air bag-equipped vehicle

If you modify your vehicle by changing your vehicle's frame, bumper system, front end or side sheet metal or ride height, this may affect the operation of your vehicle's air bag system.



### Air bag warning label (if equipped)

Air bag warning labels are attached to alert driver and passengers of potential risk of air bag system.

Note that these government warnings focus on the risk of children. We also want you to be aware of the risks adults are exposed to which have been described in previous pages.

### Keys / 4-3

Remote keyless entry (wagon) / 4-5 Remote keyless entry (sedan) / 4-9 Smart key (wagon) / 4-13 Smart key (sedan) / 4-16 Theft-alarm system / 4-19 Door locks / 4-22 Tailgate (wagon) / 4-27

# Features of your vehicle

Smart tailgate / 4- 33 Trunk (sedan) / 4-37 Smart trunk / 4-39 Windows / 4-43 Hood / 4-47 Fuel filler lid / 4-49 Panorama sunroof / 4-52 Driver position memory system / 4-56 Steering wheel / 4-58 Mirrors / 4-61 Instrument cluster / 4-65 Parking distance warning (reverse/forward) system / 4-98 Parking assist (parallel) / 4-102

- Rear view monitor / 4-112 Hazard warning flasher / 4-113 Lighting / 4-114 Wipers and washers / 4-125 Interior light / 4-130 Welcome system / 4-132
  - Defroster / 4-133
- Manual climate control system / 4-134
- Automatic climate control system / 4-144

# Features of your vehicle

Windshield defrosting and defogging / 4-156

- Storage compartment / 4-160 Interior features / 4-164 Exterior features (wagon) / 4-174
  - Audio system / 4-176

### **KEYS**

#### Record your key number



The key code number is stamped or printed on the key code tag attached to the key set.

Should you lose your keys, we recommend that you contact an authorized HYUNDAI dealer. Remove the key code tag and store it in a safe place. Also, record the key code number and keep it in a safe and handy place, but not in the vehicle.

### **Key operations**

- Used to start the engine.
- Used to lock and unlock the doors.
- Used to lock and unlock the glove box.

# A WARNING

We recommend that you use parts for replacement from an authorized HYUNDAI dealer. If an aftermarket key is used, the ignition switch may not return to ON after START. If this happens, the starter will continue to operate causing damage to the starter motor and possible fire due to excessive current in the wiring.

# **A** WARNING

- Ignition key (Smart key) Leaving children unattended in a vehicle with the ignition key (smart key) is dangerous even if the key is not in the ignition switch or the **ENGINE START/STOP button is** ACC or ON position. Children copy adults and they could place the key in the ignition switch or press the **ENGINE START/STOP button. The** ignition key (smart key) would enable children to operate power windows or other controls, or even make the vehicle move, which could result in serious bodily injury or even death. Never leave the keys in your vehicle with unsupervised children, when the Engine is runnina.

#### Immobilizer system

Your vehicle may be equipped with an electronic engine immobilizer system to reduce the risk of unauthorized vehicle use.

Your immobilizer system is comprised of a small transponder in the key and electronic devices inside the vehicle.

#### Vehicles without smart key system

With the immobilizer system, whenever you insert your ignition key into the ignition switch and turn it to ON, it checks and determines and verifies if the ignition key is valid or not.

If the key is valid, the engine will start. If the key is invalid, the engine will not start.

#### To deactivate the immobilizer system:

Insert the ignition key into the key cylinder and turn it to the ON position.

#### To activate the immobilizer system:

Turn the ignition key to the OFF position. The immobilizer system activates automatically. Without a valid ignition key for your vehicle, the engine will not start.

#### Vehicles with smart key system

Whenever the engine start/stop button is changed to the ON position, the immobilizer system checks and verifies if the key is valid or not.

If the key is valid, the engine will start. If the key is invalid, the engine will not start.

#### To deactivate the immobilizer system

Change the engine start/stop button to the ON position.

#### To activate the immobilizer system

Change the engine start/stop button to the OFF position. The immobilizer system activates automatically. Without a valid smart key for your vehicle, the engine will not start.

### A WARNING

In order to prevent theft of your vehicle, do not leave spare keys anywhere in your vehicle. Your immobilizer password is a customer unique password and should be kept confidential. Do not leave this number anywhere in your vehicle.

### **\* NOTICE**

When starting the engine, do not use the key with other immobilizer keys around. Otherwise the engine may not start or may stop soon after it starts. Keep each key separate in order to avoid a starting malfuntioin.

### ! CAUTION

Do not put metal accessories near the ignition switch.

The engine may not start for the metal accessories may interrupt the transponder signal from normally transmitting.

### **\* NOTICE**

If you need additional keys or lose your keys, we recommend that you consult an authorized HYUNDAI dealer.

# ! CAUTION

The transponder in your ignition key is an important part of the immobilizer system. It is designed to give years of trouble-free service, however you should avoid exposure to moisture, static electricity and rough handling. Immobilizer system malfunction could occur.

### **CAUTION**

Do not change, alter or adjust the immobilizer system because it could cause the immobilizer system to malfunction. We recommend that the system be serviced by an authorized HYUNDAI dealer.

Malfunctions caused by improper alterations, adjustments or modifications to the immobilizer system are not covered by your vehicle manufacturer warranty.

# **REMOTE KEYLESS ENTRY (WAGON) (IF EQUIPPED)**



Type B



#### Remote keyless entry system operations

### Type A

- To unfold the key, press the release button then the key will unfold automatically.
- · To fold the key, fold the key manually while pressing the release button.

# .! CAUTION

Do not fold the key without pressing the release button. This may damage the key.

### Type B

- To remove the mechanical key, press and hold the release button and remove the mechanical key.
- · To reinstall the mechanical key, put the key into the hole and push it until a click sound is heard.



OVF043003



OVF043375

#### Lock (1)

- 1. Close all doors.
- 2. Press the lock button.
- 3. The hazard warning light will blink once to indicate that all doors are locked (the engine hood and tailgate must be closed).

45

### **\*** NOTICE

The doors will not lock if any door is opened.

#### Unlock (2)

- 1. Press the unlock button.
- 2. The hazard warning lights will blink twice to indicate that all doors are unlocked.

### **\* NOTICE**

After unlocking all doors, the doors will lock automatically unless a door is opened within 30 seconds.

#### Tailgate unlock (3)

#### Non-powered tailgate.

- 1. Press the tailgate unlock button for more than 1 second.
- 2. The hazard warning light will blink twice to indicate the tailgate is unlocked.

### **\* NOTICE**

- After unlocking the tailgate, the tailgate will lock automatically unless it is opened within 30 seconds.
- Once the tailgate is opened and then closed, the tailgate will lock automatically.

#### Power tailgate

- 1. Press the tailgate unlock button for more than 1 second.
- 2. The hazard warning light will blink and chime will sound twice to indicate the tailgate is unlocked and opened.

### **\* NOTICE**

Once the tailgate is opened and then closed, the tailgate will lock automatically.

### Transmitter precautions \* NOTICE

The transmitter will not work if any of following occur:

- The ignition key is in ignition switch.
  - You exceed the operating distance limit (about 10 m [30 feet]).
  - The battery in the transmitter is weak.
  - Other vehicles or objects may be blocking the signal.
  - The weather is extremely cold.
  - The transmitter is close to a radio transmitter such as a radio station or an airport which can interfere with normal operation of the transmitter.

When the transmitter does not work correctly, open and close the door with the ignition key. If you have a problem with the transmitter, we recommend that you contact an authorized HYUNDAI dealer.

(Continued)

(Continued)

#### • If the transmitter is in close proximity to your cell phone or smart phone, the signal from the transmitter could be blocked by normal operation of your cell phone or smart phone. This is especially important when the phone is active such as making call, receiving calls, text messaging, and/or sending/ receiving emails. Avoid placing the transmitter and your cell phone or smart phone in the same pants or jacket pocket and maintain adequate distance between the two devices.

# ! CAUTION

Keep the transmitter away from water or any liquid and fire. If the inside of the transmitter gets damp (due to drinks or moisture), or is heated, internal circuit may malfunction, excluding the car from the warranty.

### .! CAUTION

Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment. If the keyless entry system is inoperative due to changes or modifications not expressly approved by the party responsible for compliance, it will not be covered by your manufacturer's vehicle warranty.

# ! CAUTION

Keep the transmitter away from electromagnetic materials that blocks electromagnetic waves to the key surface.





#### **Battery replacement**

A battery should last for several years, but if the transmitter or smart key is not working properly, try replacing the battery with a new one. If you are unsure how to use or replace the battery, we recommend that you contact an authorized HYUNDAI dealer.

- 1. Insert a slim tool into the slot and gently pry open the cover.
- 2. Replace the battery with a new battery (CR2032). When replacing the battery, make sure the battery position.
- 3. Install the rear cover.

For transmitter or smart key replacement, we recommend that you contact an authorized HYUNDAI dealer.

### ! CAUTION

- The transmitter or smart key is designed to give you years of trouble-free use, however it can malfunction if exposed to moisture or static electricity. If you are unsure how to use or replace the battery, we recommend that you contact an authorized HYUNDAI dealer.
- Using the wrong battery can cause the transmitter or smart key to malfunction. Be sure to use the correct battery.
- To avoid damaging the transmitter or smart key, don't drop it, get it wet, or expose it to heat or sunlight.

### ! CAUTION

An inappropriately disposed battery can be harmful to the environment and human health.

Dispose the battery according to your local law(s) or regulation.

# **REMOTE KEYLESS ENTRY (SEDAN) (IF EQUIPPED)**



Type B



#### Remote keyless entry system operations

#### Type A

- To unfold the key, press the release button then the key will unfold automatically.
- To fold the key, fold the key manually while pressing the release button.

## .! CAUTION

Do not fold the key without pressing the release button. This may damage the key.

### Type B

- To remove the mechanical key, press and hold the release button and remove the mechanical key.
- · To reinstall the mechanical key, put the key into the hole and push it until a click sound is heard.



OVF043003



OVF043375

#### Lock (1)

- 1. Close all doors.
- 2. Press the lock button.
- 3. The hazard warning light will blink once to indicate that all doors are locked (the engine hood and trunk must be closed).

### **\* NOTICE**

The doors will not lock if any door is opened.

#### Unlock (2)

- 1. Press the unlock button.
- 2. The hazard warning lights will blink twice to indicate that all doors are unlocked.

### **\* NOTICE**

After unlocking all doors, the doors will lock automatically unless a door is opened within 30 seconds.

#### Trunk open (3)

- 1. Press the trunk open button for more than 1 second.
- 2. The hazard warning light will blink twice to indicate the trunk is opened.

### **\* NOTICE**

Once the trunk is opened and then closed, the trunk will lock automatically.

### Transmitter precautions \* NOTICE

The transmitter will not work if any of following occur:

- The ignition key is in ignition switch.
  - You exceed the operating distance limit (about 10 m [30 feet]).
  - The battery in the transmitter is weak.
  - Other vehicles or objects may be blocking the signal.
  - The weather is extremely cold.
  - The transmitter is close to a radio transmitter such as a radio station or an airport which can interfere with normal operation of the transmitter.

When the transmitter does not work correctly, open and close the door with the ignition key. If you have a problem with the transmitter, we recommend that you contact an authorized HYUNDAI dealer.

(Continued)

• If the transmitter is in close proximity to your cell phone or smart phone, the signal from the transmitter could be blocked by normal operation of your cell phone or smart phone. This is especially important when the phone is active such as making call, receiving calls, text messaging, and/or sending/ receiving emails. Avoid placing the transmitter and your cell phone or smart phone in the same pants or jacket pocket and maintain adequate distance between the two devices.

# ! CAUTION

Keep the transmitter away from water or any liquid and fire. If the inside of the transmitter gets damp (due to drinks or moisture), or is heated, internal circuit may malfunction, excluding the car from the warranty.

# ! CAUTION

Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment. If the keyless entry system is inoperative due to changes or modifications not expressly approved by the party responsible for compliance, it will not be covered by your manufacturer's vehicle warranty.

# ! CAUTION

Keep the transmitter away from electromagnetic materials that blocks electromagnetic waves to the key surface. ■ Type A



OLM042302



### Battery replacement

A battery should last for several years, but if the transmitter or smart key is not working properly, try replacing the battery with a new one. If you are unsure how to use or replace the battery, we recommend that you contact an authorized HYUNDAI dealer.

- 1. Insert a slim tool into the slot and gently pry open the cover.
- 2. Replace the battery with a new battery (CR2032). When replacing the battery, make sure the battery position.
- 3. Install the rear cover.

For transmitter or smart key replacement, we recommend that you contact an authorized HYUNDAI dealer.

### ! CAUTION

- The transmitter or smart key is designed to give you years of trouble-free use, however it can malfunction if exposed to moisture or static electricity. If you are unsure how to use or replace the battery, we recommend that you contact an authorized HYUNDAI dealer.
- Using the wrong battery can cause the transmitter or smart key to malfunction. Be sure to use the correct battery.
- To avoid damaging the transmitter or smart key, don't drop it, get it wet, or expose it to heat or sunlight.

### ! CAUTION

An inappropriately disposed battery can be harmful to the environment and human health.

Dispose the battery according to your local law(s) or regulation.

# SMART KEY (WAGON) (IF EQUIPPED)



OVF043375

### Smart key function

- 1. Door lock
- 2. Door unlock
- 3. Tailgate open

With a smart key, you can lock or unlock a door and tailgate and even start the engine without inserting the key.

The functions of the buttons on a smart key are similar to the remote keyless entry. Refer to the "Remote keyless entry" in this section.



Carrying the smart key, you may lock and unlock the vehicle doors and tailgate.

Also, you may start the engine. Refer to the following, for more details.

### Locking

- 1. Carry the smart key.
- 2. Close all doors.
- 3. Press the button of the outside door handle.
- 4. The hazard warning lights will blink once (the engine hood and tailgate must be closed).
- 5. Make sure that doors are locked by pulling the outside door handle.

# \* NOTICE

- The button will only operate when the smart key is within 0.7 m (28 in.) from the outside door handle.
- Even though you press the outside door handle button, the doors will not lock and the chime will sound for 3 seconds if any of following occur:
  - The smart key is in the vehicle.
  - The engine start/stop button is in ACC or ON position.
  - Any door except the tailgate is opened.

#### Unlocking

- 1. Carry the smart key.
- 2. Press the button of the front outside door handle.
- 3. All doors will unlock and the hazard warning lights will blink twice.

# **\*** NOTICE

- The button will only operate when the smart key is within 0.7 m (28 in.) from the outside door handle.
- When the smart key is recognized in the area of 0.7 m (28 in.) from the front outside door handle, other people can also open the doors.
- After unlocking all doors, the doors will lock automatically unless a door is opened.

### Tailgate unlocking

- 1. Carry the smart key.
- 2. Press the tailgate handle switch.
- 3. The tailgate will unlock.

# **\*** NOTICE

- Once the tailgate is opened and then closed, the tailgate will lock automatically.
- The button will only operate when the smart key is within 0.7 m (28 in.) from the tailgate handle.

### Smart key precautions \* NOTICE

- If, for some reason, you happen to lose your smart key, you will not be able to start the engine. Tow the vehicle, if necessary, and we recommend that you contact an authorized HYUNDAI dealer.
- A maximum of 2 smart keys can be registered to a single vehicle. If you lose a smart key, we recommend that you contact an authorized HYUNDAI dealer.
- The smart key will not work if any of the following occurs:
  - The smart key is close to a radio transmitter such as a radio station or an airport which can interfere with normal operation of the smart key.
  - The smart key is near a mobile twoway radio system or a cellular phone.
  - Another vehicle's smart key is being operated close to your vehicle.

When the smart key does not work properly, open and close the door with the mechanical key. If you have a problem with the smart key, we recommend that you contact an authorized HYUNDAI dealer.

(Continued)

• If the smart key is in close proximity to your cell phone or smart phone, the signal from the smart key could be blocked by normal operation of your cell phone or smart phone. This is especially important when the phone is active such as making call, receiving calls, text messaging, and/or sending/receiving emails. Avoid placing the smart key and your cell phone or smart phone in the same pants or jacket pocket and maintain adequate distance between the two devices.

# . ! CAUTION

Keep the smart key away from water or any liquid and fire. If the inside of the smart key gets damp (due to drinks or moisture), or is heated, internal circuit may malfunction, excluding the car from the warranty.

# ! CAUTION

Keep the smart key away from electromagnetic materials that blocks electromagnetic waves to the key surface.

### **\* NOTICE**

Always have the smart key with you when leaving the vehicle. If the smart key is left near the vehicle, the vehicle battery may be discharged.



### Door lock/unlock in an emergency situation

If the smart key does not operate normally, you can lock or unlock the doors by using the mechanical key.

- 1. Press and hold the release button (1) and remove the mechanical key (2).
- 2. Insert the key into the hole of the outside door handle. Turn the key toward the rear of the vehicle to unlock and toward the front of the vehicle to lock.
- 3. To reinstall the mechanical key, put the key into the hole and push it until a click sound is heard.

# SMART KEY (SEDAN) (IF EQUIPPED)



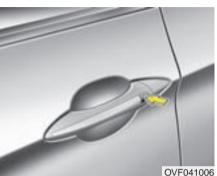
OVF043375

### Smart key function

- 1. Door lock
- 2. Door unlock
- 3. Trunk open

With a smart key, you can lock or unlock a door and trunk and even start the engine without inserting the key.

The functions of the buttons on a smart key are similar to the remote keyless entry. Refer to the "Remote keyless entry" in this section.



Carrying the smart key, you may lock and unlock the vehicle doors and trunk.

Also, you may start the engine. Refer to the following, for more details.

### Locking

- 1. Carry the smart key.
- 2. Close all doors.
- 3. Press the button of the outside door handle.
- 4. The hazard warning lights will blink once (the engine hood and trunk must be closed).
- 5. Make sure that doors are locked by pulling the outside door handle.

# \* NOTICE

- The button will only operate when the smart key is within 0.7 m (28 in.) from the outside door handle.
- Even though you press the outside door handle button, the doors will not lock and the chime will sound for 3 seconds if any of following occur:
  - The smart key is in the vehicle.
  - The engine start/stop button is in ACC or ON position.
  - Any door except the trunk is opened.

#### Unlocking

- 1. Carry the smart key.
- 2. Press the button of the front outside door handle.
- 3. All doors will unlock and the hazard warning lights will blink twice.

# **\*** NOTICE

- The button will only operate when the smart key is within 0.7 m (28 in.) from the outside door handle.
- When the smart key is recognized in the area of 0.7 m (28 in.) from the front outside door handle, other people can also open the doors.
- After unlocking all doors, the doors will lock automatically unless a door is opened.

### Trunk opening

- 1. Carry the smart key.
- 2. Press the trunk handle switch.
- 3. The trunk will open.

# **\*** NOTICE

- Once the trunk is opened and then closed, the trunk will lock automatically.
- The button will only operate when the smart key is within 0.7 m (28 in.) from the trunk handle.

### Smart key precautions \* NOTICE

- If, for some reason, you happen to lose your smart key, you will not be able to start the engine. Tow the vehicle, if necessary, and we recommend that you contact an authorized HYUNDAI dealer.
- A maximum of 2 smart keys can be registered to a single vehicle. If you lose a smart key, we recommend that you contact an authorized HYUNDAI dealer.
- The smart key will not work if any of the following occurs:
  - The smart key is close to a radio transmitter such as a radio station or an airport which can interfere with normal operation of the smart key.
  - The smart key is near a mobile twoway radio system or a cellular phone.
  - Another vehicle's smart key is being operated close to your vehicle.

When the smart key does not work properly, open and close the door with the mechanical key. If you have a problem with the smart key, we recommend that you contact an authorized HYUNDAI dealer.

(Continued)

• If the smart key is in close proximity to your cell phone or smart phone, the signal from the smart key could be blocked by normal operation of your cell phone or smart phone. This is especially important when the phone is active such as making call, receiving calls, text messaging, and/or sending/ receiving emails. Avoid placing the smart key and your cell phone or smart phone in the same pants or jacket pocket and maintain adequate distance between the two devices.

# ! CAUTION

Keep the smart key away from water or any liquid and fire. If the inside of the smart key gets damp (due to drinks or moisture), or is heated, internal circuit may malfunction, excluding the car from the warranty.

# ! CAUTION

Keep the smart key away from electromagnetic materials that blocks electromagnetic waves to the key surface.

### **\* NOTICE**

Always have the smart key with you when leaving the vehicle. If the smart key is left near the vehicle, the vehicle battery may be discharged.



### Door lock/unlock in an emergency situation

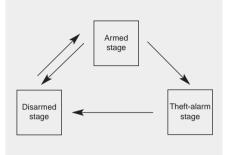
If the smart key does not operate normally, you can lock or unlock the doors by using the mechanical key.

- 1. Press and hold the release button (1) and remove the mechanical key (2).
- 2. Insert the key into the hole of the outside door handle. Turn the key toward the rear of the vehicle to unlock and toward the front of the vehicle to lock.
- 3. To reinstall the mechanical key, put the key into the hole and push it until a click sound is heard.

### THEFT-ALARM SYSTEM (IF EQUIPPED)



Vehicles equipped with a theft alarm system will have a label attached to the vehicle with the following words: 1. WARNING 2. SECURITY SYSTEM



This system is designed to provide protection from unauthorized entry into the vehicle. This system is operated in three stages: the first is the "Armed" stage, the second is the "Theft-alarm" stage, and the third is the "Disarmed" stage. If triggered, the system provides an audible alarm with blinking of the hazard warning lights.

#### Armed stage

#### Using the smart key

Park the vehicle and stop the engine. Arm the system as described below.

- 1. Turn off the engine.
- 2. Make sure that all doors, the engine hood and tailgate/trunk are closed and latched.
- 3.• Lock the doors by pressing the button of the front outside door handle with the smart key in your possession.

After completion of the steps above, the hazard warning lights will operate once to indicate that the system is armed.

If the tailgate/trunk or engine hood remains opened, the hazard warning lights will not operate and theft-alarm will not arm. After this, if the tailgate/ trunk and engine hood are closed, the hazard warning lights will blink once. • Lock the doors by pressing the lock button on the smart key.

After completion of the steps above, the hazard warning lights will operate once to indicate that the system is armed.

If any door, tailgate/trunk or engine hood remains open, the hazard warning lights won't operate and theftalarm will not arm. After this, if all doors, tailgate/trunk and engine hood are closed, the hazard warning lights will blink once.

#### Using the transmitter

Park the vehicle and stop the engine. Arm the system as described below.

- 1. Turn off the engine and remove the ignition key from the ignition switch.
- 2. Make sure that all doors, the engine hood and tailgate/trunk are closed and latched.
- 3. Lock the doors by pressing the lock button on the transmitter.

After completion of the steps above, the hazard warning lights will blink once to indicate that the system is armed.

If any door, tailgate/trunk or engine hood remains opened, the hazard warning lights will not operate and theft-alarm will not arm. After this, if all doors, tailgate/trunk and engine hood are closed, the hazard warning lights will blink once. • Do not arm the system until all passengers have left the vehicle. If the system is armed while a passenger(s) remains in the vehicle, the alarm may be activated when the remaining passenger(s) leave the vehicle. If any door, tailgate/trunk lid or engine hood is opened within 30 seconds after entering the armed stage, the system is disarmed to prevent unnecessary alarm.

### Theft-alarm stage

The alarm will be activated if any of the following occurs while the system is armed.

- A front or rear door is opened without using transmitter or smart key.
- The tailgate/trunk is opened without using transmitter or smart key.
- The engine hood is opened.

The siren will sound and the hazard warning lights will blink continuously for 27 seconds, unless the system is disarmed. To turn off the system, unlock the doors with the transmitter or smart key.

### **Disarmed stage**

The system will be disarmed when: *Transmitter* 

- The door unlock button is pressed.
- The engine is started.
- The ignition switch is in the "ON" position for 30 seconds or more.

#### Smart key

- The door unlock button is pressed.
- The button of the front outside door is pressed while carrying the smart key.
- The engine is started.

After the doors are unlocked, the hazard warning lights will blink twice to indicate that the system is disarmed.

After pressing the unlock button, if any door (or tailgate/trunk) is not opened within 30 seconds, the system will be rearmed.

### **\* NOTICE**

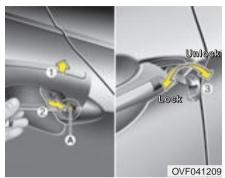
- Without smart key system If the system is not disarmed with the transmitter, insert the key into the ignition switch and start the engine. Then the system will be disarmed.
- With smart key system If the system is not disarmed with the smart key, open the door with the mechanical key and start the engine. Then the system will be disarmed.
- If you lose your keys, we recommend that you contact an authorized HYUNDAI dealer.

# ! CAUTION

Do not change, alter or adjust the theft-alarm system because it could cause the theft-alarm system to malfunction and we recommend that you serviced an authorized HYUNDAI dealer.

Malfunctions caused by improper alterations, adjustments or modifications to the theft-alarm system are not covered by your vehicle manufacturer warranty.

# DOOR LOCKS



#### Operating door locks from outside the vehicle

Mechanical key

To remove the cover:

- 1. Pull out the door handle (1).
- 2. Press the lever (A) located inside the bottom part of the cover with a key or flat-head screwdriver (2).
- 3. Push out the cover while pressing the lever.

# ! CAUTION

Be careful not to damage the cover while removing it or misplace it after removing it.

- After removing the cover, turn the key toward the rear of the vehicle to unlock and toward the front of the vehicle to lock (3).
- If you lock/unlock the driver's door with a key, only the driver's door will lock/unlock.
- Once the door is unlocked, it may be opened by pulling the door handle.
- When closing the door, push the door by hand. Make sure that doors are closed securely.

#### Transmitter/Smart key

- Doors can be locked and unlocked with the transmitter or smart key.
- Doors can be locked and unlocked pressing the button of the outside door handle with the smart key in your possession. (vehicles equipped with smart key system)
- Once the doors are unlocked, they may be opened by pulling the door handle.
- When closing the door, push the door by hand. Make sure that doors are closed securely.

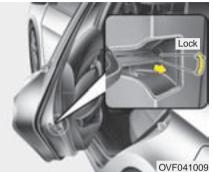
### **\* NOTICE**

- In cold and wet climates, door lock and door mechanisms may not work properly due to freezing conditions.
- If the door is locked/unlocked multiple times in rapid succession with either the vehicle key or door lock switch, the system may stop operating temporarily in order to protect the circuit and prevent damage to system components.

# A WARNING

- If you don't close the door securely, the door may open again.
- Be careful that someone's body and hands are not trapped when closing the door.

4 22



In case of an emergency

If the power door lock switch does not operate electrically, the only way to lock the door(s) is with the mechanical key from the outside key hole.

Doors without the outside key hole, you can lock the door as follows:

- 1. Open the door.
- 2. Insert the key into the emergency door lock hole and turn the key horizontally to lock.
- 3. Close the door securely.

### **\* NOTICE**

Once the tailgate/trunk is closed when the power door lock switch does not operate electrically, you will not be able to open the tailgate/trunk.



Operating door locks from inside the vehicle

#### With the door handle

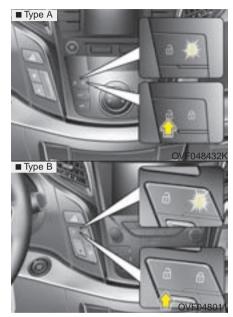
#### Front door

If the inner door handle is pulled when the door is locked, the door will unlock and open.

#### Rear door

If the inner door handle is pulled once when the door is locked, the door will unlock.

If the inner door handle is pulled once more, the door will open.



With central door lock/unlock switch It is operated by pressing the door lock/unlock switch.

- When you press the central door lock switch, all vehicle doors will lock and the indicator light on the switch will illuminate.
- · If any door is opened when the switch is pressed, all doors will not lock.

- If any door is unlocked, the indicator of the central door lock switch will go off.
- When you press the central door unlock switch, all vehicle doors will unlock.

### **\* NOTICE**

Once the doors are locked with the transmitter or smart key, the doors cannot be unlocked with the central door lock/unlock switch.

### A WARNING - Door lock malfunction

If a power door lock ever fails to function while you are in the vehicle, try one or more of the following:

- Operate the other door locks and handles.
- Lower the driver's window and use the key to unlock the door from outside.
- Move to the cargo area and open the tailgate. (wagon)

# A WARNING - Doors

- The doors should always be fully closed and locked while the vehicle is in motion to prevent accidental opening of the door. Locked doors will also discourage potential intruders when the vehicle stops or slows down.
- Do not pull the inner door handle of driver's or passenger's door while the vehicle is moving.
- Be careful when opening doors and watch for vehicles, motorcycles, bicycles or pedestrians approaching the vehicle in the path of the door. Opening a door when something is approaching can cause damage or injury.

# A WARNING

If you stay in the vehicle for a long time while the weather is very hot or cold, there are risks of injuries or danger to life. Do not lock the vehicle from the outside when someone is in the vehicle.

# A WARNING - Unlocked vehicles

Leaving your vehicle unlocked can invite theft or possible harm to you or others from someone hiding in your vehicle while you are gone. Always remove the ignition key, engage the parking brake, close all windows and lock all doors when leaving your vehicle unattended.

# WARNING - Unattended children

An enclosed vehicle can become extremely hot, causing death or severe injury to unattended children or animals who cannot escape the vehicle. Furthermore, children might operate features of the vehicle that could injure them, or they could encounter other harm, possibly from someone gaining entry to the vehicle. Never leave children or animals unattended in your vehicle.

### Deadlocks (if equipped)

Some vehicles are equipped with a deadlock system. Deadlocks prevent opening of a door from either inside or outside the vehicle once the deadlocks have been activated providing an additional measure of vehicle security.

To lock the vehicle using the deadlock function, the doors must be locked by using the transmitter or smart key. To unlock the vehicle, the transmitter or smart key must be used again.

# A WARNING

Do not lock the doors with the transmitter or the smart key with anybody left in the vehicle. The passenger in the vehicle cannot unlock the doors with the door lock button. For example, if the door is locked with the transmitter, the passenger in the vehicle cannot unlock the door without the transmitter.

#### Door lock/unlock features

*Impact sensing door unlock system* All doors will automatically unlock when an impact causes the air bags to deploy.

# Speed sensing door lock system (if equipped)

All doors will automatically lock after the vehicle speed exceeds 15 km/h.

Engine off door unlock system (if equipped)

All doors will automatically unlock:

#### Without smart key system

When the key is removed from the ignition switch.

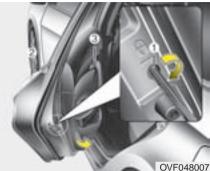
#### With smart key system

When the engine start/stop button is in the OFF position.

#### Shift lever door lock/unlock system

- All doors will automatically lock when the shift lever is moved out of P (Park).
- All doors will automatically unlock when the shift lever is moved into P (Park).

You can activate or deactivate the auto door lock/unlock features in the vehicle. Refer to "User setting" in this section.



### Child-protector rear door lock

The child safety lock is provided to help prevent children from accidentally opening the rear doors from inside the vehicle. The rear door safety locks should be used whenever children are in the vehicle.

- 1. Open the rear door.
- 2. Insert a key (or screwdriver) into the hole (1) and turn it to the "lock( 1)" position. When the child safety lock is in the lock position, the rear door will not open even though the inner door handle (3) is pulled inside the vehicle.

3 Close the rear door

To open the rear door, pull the outside door handle (2).

Even though the doors may be unlocked, the rear door will not open by pulling the inner door handle (3) until rear door child safety lock is unlocked.

### A WARNING - Rear door locks

If children accidentally open the rear doors while the vehicle is in motion, they could fall out and be severely injured or killed. To prevent children from opening the rear doors from the inside, the rear door safety locks should be used whenever children are in the vehicle.

# **TAILGATE (WAGON)**



#### Non-powered tailgate

#### Opening the tailgate

- The tailgate is locked or unlocked when all doors are locked or unlocked with the key, transmitter, smart key or central door lock/unlock switch
- · Only the tailgate is unlocked if the tailgate unlock button on the transmitter or smart key is pressed for approximately 1 second.
- · If unlocked, the tailgate can be opened by pressing the handle and pulling it up.
- Once the tailgate is opened and then closed, the tailgate locks automatically. (All doors must be locked.)

### **\* NOTICE**

In cold and wet climates, door lock and door mechanisms may not work properly due to freezing conditions.

# A WARNING

The tailgate swings upward. Make sure no objects or people are near the rear of the vehicle when opening the tailgate.

# ! CAUTION

Make certain that you close the tailgate before driving your vehicle. Possible damage may occur to the tailgate lift cylinders and attaching hardware if the tailqate is not closed prior to driving.



#### Closing the tailgate

Lower and push down the tailgate firmly. Make sure that the tailgate is securely latched

# A WARNING

Make sure your hands, feet and other parts of your body are safely out of the way before closing the tailgate.

### ! CAUTION

Make sure nothing is near the tailgate latch and striker while closing the tailqate. It may damage the tailgate's latch.

# A WARNING - Exhaust fumes

If you drive with the tailgate opened, you will draw dangerous exhaust fumes into your vehicle which can cause serious injury or death to vehicle occupants.

If you must drive with the tailgate opened, keep the air vents and all windows open so that additional outside air comes into the vehicle.

# A WARNING - Rear cargo area

Occupants should never ride in the rear cargo area where no restraints are available. To avoid injury in the event of an accident or sudden stops, occupants should always be properly restrained.



OVF041015/OVF041014/OVF041016

### Power tailgate (if equipped)

- (1) Power tailgate open button
- (2) Power tailgate handle switch
- (3) Power tailgate close button

### **\* NOTICE**

The power tailgate operates when: Manual shift lever is in neutral.

# A WARNING

Never leave children or animals unattended in your vehicle. Children or animals might operate the power tailgate that could result in injury to themselves or others, or damage the vehicle.

# **A** WARNING

Make sure there are no people or objects around the tailgate before operating the power tailgate. Wait until the tailgate is opened fully and stopped before loading or unloading cargo or passengers from the vehicle.

Do not close or open the power tailgate manually. This may cause damage to the power tailgate. If it is necessarv to close or open the power tailgate manually when the battery is discharged or disconnected, do not apply excessive force.



Opening the tailgate The power tailgate will open automatically by doing one of the following:

- · Press the tailgate unlock button on the transmitter or smart key.
- · Press the power tailgate open button.



· Press the tailgate handle switch carrying the smart key with you.



Closing the tailgate

- 1. Press the power tailgate close button (approximately 1 second).
- 2. The tailgate will close and lock automatically.

# A WARNING

The chime will sound and the hazard warning flasher will blink 10 times if you drive with the tailgate closed but not locked. Stop your vehicle immediately at a safe place and check if your tailqate is securely locked.

# A WARNING



Do not hold the part (gas lifter) that supports the tailgate. Be aware that the deformation of the part may cause vehicle damage and a risk of safety accident.

#### Power tailgate non-opening conditions

The power tailgate will not open or close automatically, when the vehicle is moving more than 3km/h (2mph).

# A WARNING

The chime will sound continuously if you drive over 3km/h(2mph) with the tailgate opened. Stop your vehicle immediately at a safe place and check if your tailgate is opened.

### **\* NOTICE**

- The power tailgate can be operated when the engine is not running. However the power tailgate operation consumes large amounts of vehicle electric power. To prevent the battery from being discharged, do not operate it excessively e.g.: more than approximately 10 times repeatedly.
- To prevent the battery from being discharged, do not leave the power tailgate in the open position for a long lime.
- Do not modify or repair any part of the power tailgate by yourself. We recommend that you contact an authorized HYUNDAI dealer.
- When jacking up the vehicle to change a tire or repair the vehicle, do not operate the power tailgate. This could cause the power tailgate to operate improperly.
- In cold and wet climates, the power tailgate may not work properly due to freezing conditions.



OVF048017

#### Automatic reversal

During power opening and closing if the power tailgate is blocked by an object or part of the body, the power tailgate will detect the resistance

- If the resistance is detected while opening the tailgate, it will stop and move in the opposite direction.
- If the resistance is detected while closing the tailgate, it will stop and move in the opposite direction.

However, if the resistance is weak such as from an object that is thin or soft, or the tailgate is near the latched position. the automatic stop and reversal may not detect the resistance.

If the automatic reversal feature operates continuously more than twice during opening or closing operation, the power tailgate may stop at that position. At this time, close the tailgate manually and operate the tailgate automatically again.

# **A** WARNING

Never intentionally place any object or part of your body in the path of the power tailgate to make sure the automatic reversal operates.

#### How to reset the power tailgate

If the battery has been discharged or disconnected, or if the related fuse has been replaced or disconnected, for the power tailgate to operate normally, reset the power tailgate as follow:

- 1. Put the shift lever in P (Park).
- 2. Press the tailgate handle switch and tailgate close button at the same time for more than 3 seconds. (the chime will sound)
- 3. Close the tailgate manually.

If the power tailgate does not work properly after the above procedure, we recommend that the system be checked by an authorized HYUNDAI dealer.

### **\* NOTICE**

If the power tailgate does not operate normally, first check the following condition before using the power tailgate. Check if the shift lever is in: neutral for manual transaxle vehicles.



Power tailgate opening height user setting

The driver may set the height of a fully opened tailgate by following the below instruction.

- 1. Position the tailgate manually to the height you prefer.
- 2. Press the tailgate close button for more than 3 seconds.
- 3. Close the tailgate manually after hearing the buzzer sound.

The tailgate will open to the height the driver has set up.



### Emergency tailgate safety release

Your vehicle is equipped with the emergency tailgate safety release lever located on the bottom of the tailgate. When someone is inadvertently locked in the luggage compartment. The tailgate can be opened by doing as follows:

- 1. Remove the cover.
- 2. Push the release lever to the right.
- 3. Push up the tailgate.

# A WARNING

- For emergencies, be fully aware of the location of the emergency tailgate safety release lever in the vehicle and how to open the tailgate if you are accidentally locked in the luggage compartment.
- No one should be allowed to occupy the luggage compartment of the vehicle at any time. The luggage compartment is a very dangerous location in the event of a crash.
- Use the release lever for emergencies only. Use with extreme caution, especially while the vehicle is in motion.

4 32

### SMART TAILGATE (IF EQUIPPED)

#### Smart tailgate system

On the vehicle equipped with a smart key, the tailgate can be opened with notouch activation using the Smart tailgate system.

#### How to use the Smart tailgate

The tailgate can be opened with notouch activation satisfying below all conditions when all doors are closed and locked.

- After 15 seconds when all doors are closed and locked
- Position in the detecting area (Approx. 50~100 cm behind the vehicle) for more than 3 seconds. (The Hazard warning lights operate.)

#### 1. Setting

The Smart tailgate function is deactivated by default.

You can set the Smart tailgate function on User setting mode of the cluster.

\* For more details, refer to "Instrument Cluster" in this section.



2. Detecting and Alert

If you position in the detecting area (Approx. 50~100 cm behind the vehicle) with carrying the smart key, the hazard warning lights operate to alert you the smart key has been detected and the tailgate will open.

• Stage 1 (Welcome alert)

The hazard warning lights operate once when approaching the tailgate.

Stage 2 (Detecting alert)

The hazard warning lights operate 3 times for 3 seconds

• Stage 3 (Opening alert)

The hazard warning lights operate 2 times.

 If you do not want to open the tailgate, do not approach the detecting area.

If the hazard warning lights operate inadvertently in the detecting area, keep the smart key away from the rear bumper detection area.

• If you position in the detecting area, the tailgate may open inadvertently.



3. Automatic opening The hazard warning lights operate 6 times, and then the tailgate opens slowly.

# A WARNING

- Make certain that you close the tailgate before driving your vehicle.
- Make sure there are no people or objects around the tailgate before opening or closing the tailgate.
- Make sure objects in the rear cargo area do not come out when opening the tailgate on the slope way. It may cause serious injury.
- Make sure to deactivate the Smart tailgate function when washing your vehicle. Otherwise, the tailgate may open inadvertently.
- Your vehicle should be kept locked and the key should be kept out of the reach of children. Parents should teach their children about the dangers of playing in the luggage compartment.

- If the Smart tailgate function is activated, this function is activated after 15 seconds when all doors are closed and locked.
- If you position within 1.5 m from driver's door handle (or passenger's door handle), the Smart tailgate function is not deactivated. (if welcome function is activated)
- The Smart tailgate function is deactivated when any door are open or unlocked.
- If the smart key positions in the detecting area within 15 seconds when all doors are closed and locked, it takes about 10 minutes and then the Smart tailgate function is deactivated.
- The Smart tailgate function is deactivated when the smart key is in the vehicle.

#### Smart key



OVF043375L

- 1. Door lock
- 2. Door unlock
- 3. Tailgate open
- 4. Indicator

How to deactivate the Smart tailgate function using the smart key

If you press the any button of the smart key during detecting and alert, the smart tailgate function is deactivated.

# A WARNING

- Make sure to be aware of procedure to deactivate the Smart tailgate function for emergencies.
- If you press the door unlock button(2), the Smart tailgate function is deactivated temporarily. Then, if you do not open any door for 30 seconds, the Smart tailgate function is activated again.
- If you press the tailgate open button(3) for more than 1 second, the tailgate opens.
- If you press the door lock button (1) or tailgate open button(3) when there are not detecting and alert conditions, the Smart tailgate function is not deactivated.

In case that you deactivate the Smart tailgate function by pressing the smart key button, the smart tailgate function is deactivated until all doors are closed and locked.



#### OVF048353

- If the smart key is detected within 50~100 cm from the tailgate, the Smart tailgate function operates with the welcome alert.
- If the smart key positions outside the detecting area during detecting and alert, the alert stops at once.

### ! CAUTION

- The Smart tailgate function will not work if any of the following occur :
  - The smart key is close to a radio transmitter such as a radio station or an airport which can interfere with normal operation of the transmitter.
  - The smart key is near a mobile two way radio system or a cellular phone.
  - Another vehicle's smart key is being operated close to your vehicle.
- The detecting range may decrease or increase when :
  - The one side of tire is raised for replacing tire or inspecting the vehicle.
  - The vehicle is slantingly parked on sloping road or unpaved road. etc.

### **TRUNK (SEDAN)**



### **Opening the trunk**

- Press the trunk unlock button for more than 1 second on the transmitter (or smart kev).
- · Press the button on the trunk handle with the smart key in your possession.

Once the trunk is opened and then closed, the trunk locks automatically.



• To open the trunk from inside the vehicle, press the trunk lid release switch. Once the trunk is opened and then closed, the trunk locks automatically.

### **\* NOTICE**

In cold and wet climates, trunk lock and trunk mechanisms may not work properly due to freezing conditions.

# A WARNING

The trunk swings upward. Make sure no objects or people are near the rear of the vehicle when opening the trunk.

# . CAUTION

Make certain that you close the trunk before driving your vehicle. Possible damage may occur to the trunk lift cylinders and attached hardware if the trunk is not closed prior to driving.

### **Closing the trunk**

To close, lower the trunk lid, then press down on it until it locks. To be sure the trunk lid is securely fastened, always check by trying to pull it up again.

# A WARNING

The trunk lid should be always kept completely closed while the vehicle is in motion. If it is left open or ajar, poisonous exhaust gases may enter the car and serious illness or death may result.

### **\* NOTICE**

If the trunk is closed with the smart key in it, the chime will sound for approximately 3 seconds and the trunk will reopen.



#### Emergency trunk safety release

Your vehicle is equipped with an emergency trunk release cable located inside the trunk. If someone is inadvertently locked in the trunk, moving the handle in the direction of the arrow will release the trunk latch mechanism and open the trunk.

# **A** WARNING

- For emergencies, be fully aware of the location of the emergency trunk safety release lever in this vehicle and how to open the trunk if you are accidentally locked in the trunk.
- No one should be allowed to occupy the trunk at any time. The trunk is a very dangerous location in the event of a crash.
- Use the release lever for emergencies only. Use extreme caution, especially while the vehicle is in motion.

### SMART TRUNK (IF EQUIPPED)

#### Smart trunk system

On the vehicle equipped with a smart key, the trunk can be opened with notouch activation using the Smart trunk system.

#### How to use the Smart trunk

The trunk can be opened with no-touch activation satisfying below all conditions when all doors are closed and locked.

- After 15 seconds when all doors are closed and locked
- Position in the detecting area (Approx. 50~100 cm behind the vehicle) for more than 3 seconds. (The Hazard warning lights operate.)

#### 1. Setting

The Smart trunk function is deactivated by default.

You can set the Smart trunk function on User setting mode of the cluster.

\* For more details, refer to "Instrument Cluster" in this section.



2. Detecting and Alert

If you position in the detecting area (Approx. 50~100 cm behind the vehicle) with carrying the smart key, the hazard warning lights operate to alert you the smart key has been detected and the tailgate will open.

• Stage 1 (Welcome alert)

The hazard warning lights operate once when approaching the trunk.

Stage 2 (Detecting alert)

The hazard warning lights operate 3 times for 3 seconds

• Stage 3 (Opening alert)

The hazard warning lights operate 2 times.

• If you do not want to open the trunk, do not approach the detecting area.

If the hazard warning lights operate inadvertently in the detecting area, keep the smart key away from the rear bumper detection area.

• If you position in the detecting area, the trunk may open inadvertently.



3. Automatic opening The hazard warning lights operate 6 times, and then the trunk opens slowly.

# **A** WARNING

- Make certain that you close the trunk before driving your vehicle.
- Make sure there are no people or objects around the trunk before opening or closing the trunk.
- Make sure objects in the rear cargo area do not come out when opening the trunk on the slope way. It may cause serious injury.
- Make sure to deactivate the Smart trunk function when washing your vehicle. Otherwise, the trunk may open inadvertently.
- Your vehicle should be kept locked and the key should be kept out of the reach of children. Parents should teach their children about the dangers of playing in the luggage compartment.

- If the Smart trunk function is activated, this function is activated after 15 seconds when all doors are closed and locked.
- If you position within 1.5 m from driver's door handle (or passenger's door handle), the Smart trunk function is not deactivated. (if welcome function is activated)
- The Smart trunk function is deactivated when any door are open or unlocked.
- If the smart key positions in the detecting area within 15 seconds when all doors are closed and locked, it takes about 10 minutes and then the Smart trunk function is deactivated.
- The Smart trunk function is deactivated when the smart key is in the vehicle.





OVF043375L

- 1. Door lock
- 2. Door unlock
- 3. Trunk open
- 4. Indicator

How to deactivate the Smart trunk function using the smart key

If you press the any button of the smart key during detecting and alert, the smart trunk function is deactivated.

# A WARNING

- Make sure to be aware of procedure to deactivate the Smart trunk function for emergencies.
- If you press the door unlock button(2), the Smart trunk function is deactivated temporarily. Then, if you do not open any door for 30 seconds, the Smart trunk function is activated again.
- If you press the trunk open button(3) for more than 1 second, the trunk opens.
- If you press the door lock button (1) or trunk open button(3) when there are not detecting and alert conditions, the Smart trunk function is not deactivated.

In case that you deactivate the Smart trunk function by pressing the smart key button, the smart trunk function is deactivated until all doors are closed and locked.



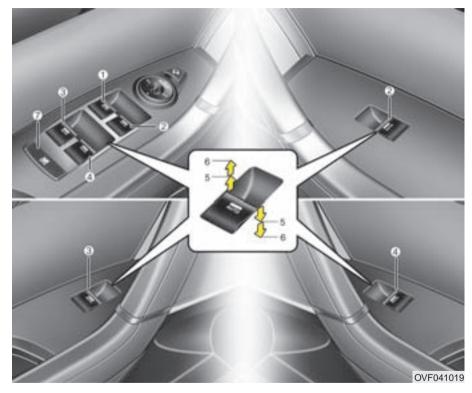
#### OVF048353K

- If the smart key is detected within 50~100 cm from the trunk, the Smart trunk function operates with the welcome alert.
- If the smart key positions outside the detecting area during detecting and alert, the alert stops at once.

### ! CAUTION

- The Smart trunk function will not work if any of the following occur
  - The smart key is close to a radio transmitter such as a radio station or an airport which can interfere with normal operation of the transmitter.
  - The smart key is near a mobile two way radio system or a cellular phone.
  - Another vehicle's smart key is being operated close to your vehicle.
- The detecting range may decrease or increase when :
  - The one side of tire is raised for replacing tire or inspecting the vehicle.
  - The vehicle is slantingly parked on sloping road or unpaved road. etc.

#### **WINDOWS**



- (1) Driver's door power window switch
- (2) Front passenger's door power window switch
- (3) Rear door (left) power window switch
- (4) Rear door (right) power window switch
- (5) Window opening and closing
- (6) Automatic power window up\*/down\*
- (7) Power window lock switch
- \*: if equipped

### **\* NOTICE**

In cold and wet climates, power windows may not work properly due to freezing conditions.

#### **Power windows**

The ignition switch must be in the ON position for power windows to operate. Each door has a power window switch that controls the door's window. The driver's door has a master power window switch that controls all the windows in the vehicle. Also, the driver has a power window lock switch which can block the operation of rear passenger windows.

The power windows can be operated for approximately 30 seconds after the ignition key is removed or turned to the ACC or LOCK position. However, if the front doors are opened, the power windows cannot be operated even within the 30 seconds period.

# A WARNING

To avoid serious injury or death, do not extend your head, arms or body outside the windows while driving.

### **\* NOTICE**

- In cold and wet climates, power windows may not work properly due to freezing conditions.
- While driving with the rear windows down or with the sunroof (if equipped) in an open (or partially open position), your vehicle may demonstrate a wind buffeting or pulsation noise. This noise is a normal occurrence and can be reduced or eliminated by taking the following actions. If the noise occurs with one or both of the rear windows down, partially lower both front windows approximately 2.5 cm (1 in). If you experience the noise with the sunroof open, slightly reduce the size of the sunroof opening.



OVF041020

Window opening and closing Type A

To open or close a window, press down or pull up the front portion of the corresponding switch to the first detent position (5).



OVF041021

#### Туре В

#### Auto up/down window (if equipped)

Pressing or pulling up the power window switch momentarily to the second detent position (6) completely lowers or lifts the window even when the switch is released. To stop the window at the desired position while the window is in operation, pull up or press down and release the switch.

#### **\* NOTICE**

If the power window does not operate normally, the automatic power window system must be reset as follows:

- 1. Turn the ignition switch to the ON position.
- 2. Close the driver's window and continue pulling up the driver's power window switch for at least 1 second after the window is completely closed.

# A WARNING

The automatic reverse feature does not activate while resetting power window system. Make sure body parts or other objects are safely out of the way before closing the windows to avoid injuries or vehicle damage.



Automatic reverse (for type B window)

If the upward movement of the window is blocked by an object or part of the body, the window will detect the resistance and will stop upward movement. The window will then lower approximately 30 cm (11.8 in.) to allow the object to be cleared.

If the window detects the resistance while the power window switch is pulled up continuously, the window will stop upward movement then lower approximately 2.5 cm (1 in.). And if the power window switch is pulled up continuously again within 5 seconds after the window is lowered by the automatic window reverse feature, the automatic window reverse will not operate.

### **\* NOTICE**

The automatic reverse feature is only active when the "auto up" feature is used by fully pulling up the switch. The automatic reverse feature will not operate if the window is raised using the halfway position on the power window switch.

# A WARNING

Always check for obstructions before raising any window to avoid injuries or vehicle damage. If an object less than 4 mm (0.16 in.) in diameter is caught between the window glass and the upper window channel, the automatic reverse window may not detect the resistance and will not stop and reverse direction.

# ! CAUTION

Do not install any accessories on the windows. The automatic reverse feature may not operate.



Power window lock button

The driver can disable the power window switches on the rear passengers' doors by pressing the power window lock switch to the lock position(pressed).

When the power window lock switch is pressed :

- The driver's master control can operate all the power windows.
- The front passenger's control can operate the front passenger's power window.
- The rear passenger's control cannot operate the rear passenger's power window.

# ! CAUTION

- To prevent possible damage to the power window system, do not open or close two windows or more at the same time. This will also ensure the longevity of the fuse.
- Never try to operate the main switch on the driver's door and the individual door window switch in opposing directions at the same time. If this is done, the window will stop and cannot be opened or closed.

#### A WARNING - Windows

- NEVER leave the keys in your vehicle with unsupervised children, when the Engine is running.
- NEVER leave any child unattended in the vehicle. Even very young children may inadvertently cause the vehicle to move, entangle themselves in the windows, or otherwise injure themselves or others.
- Always double check to make sure all arms, hands, head and other obstructions are safely out of the way before closing a window.
- Do not allow children to play with the power windows. Keep the driver's door power window lock switch in the LOCK position (pressed). Serious injury can result from unintentional window operation by the child.
- Do not extend face or arms outside the window while driving.

### HOOD



### Opening the hood

1. Pull the release lever to unlatch the hood. The hood should pop open slightly.

# A WARNING

Open the hood after turning off the engine on a flat surface, shifting the shift lever to the P(Park) position for dual clutch transmission and to the 1(First) gear or R(Reverse) for manual transaxle, and setting the parking brake.



- 2. Go to the front of the vehicle, raise the hood slightly, push up the secondary latch (1) inside of the hood center and lift the hood (2).
- 3. Raise the hood. It will raise completely by itself after it has been raised halfway.

### Closing the hood

- 1. Before closing the hood, check the following:
  - All filler caps in engine compartment must be correctly installed.
  - Gloves, rags or any other combustible material must be removed from the engine compartment.
- 2. Lower the hood halfway (lifted approximately 30cm from the closed position) and push down to securely lock in place. Then double check to be sure the hood is secure.

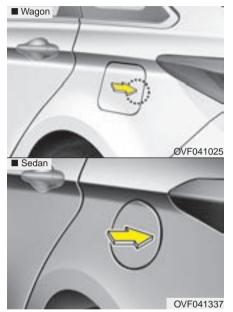
# A WARNING - Hood

- Before closing the hood, ensure that all obstructions are removed from the hood opening. Closing the hood with an obstruction present in the hood opening may result in property damage or severe personal injury.
- Do not leave gloves, rags or any other combustible material in the engine compartment. Doing so may cause a heat-induced fire.

### A WARNING

- Always double check to be sure that the hood is firmly latched before driving away. If it is not latched, the hood could fly open while the vehicle is being driven, causing a total loss of visibility, which might result in an accident.
- The support rod must be inserted completely into the hole whenever you inspect the engine compartment. This will prevent the hood from falling and possibly injuring you.
- Do not move the vehicle with the hood raised. The view will be blocked and the hood could fall or be damaged.

# FUEL FILLER LID

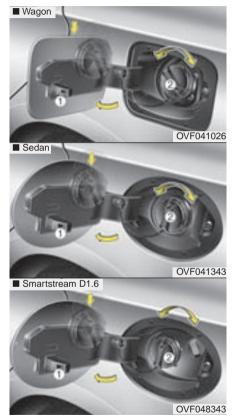


### Opening the fuel filler lid

1. To open the lid, press the center edge of the lid.

### **\* NOTICE**

The lid will open only when a door is unlocked. If the theft-alarm system is activated, the fuel filler lid will not open.



- 2. Fully open the lid.
- 3. To open the cap, turn it counterclockwise.
- 4. Refuel as needed.

# **\* NOTICE**

If the fuel-filler lid does not open because ice has formed around it, tap lightly or push on the lid to break the ice and release the lid. Do not pry on the lid. If necessary, spray around the lid with an approved de-icer fluid (do not use radiator anti-freeze) or move the vehicle to a warm place and allow the ice to melt.

### Closing the fuel filler lid

- 1. To install the cap, turn it clockwise until it "clicks". This indicates that the cap is securely tightened.
- 2. To close the lid, press the edge of the lid. Make sure it is securely closed.

# A WARNING - Refueling

- If pressurized fuel sprays out, it can cover your clothes or skin and thus subject you to the risk of fire and burns. Always remove the fuel cap carefully and slowly. If the cap is venting fuel or if you hear a hissing sound, wait until the condition stops before completely removing the cap.
- Do not "top off" after the nozzle automatically shuts off when refueling.
- Always check that the fuel cap is installed securely to prevent fuel spillage in the event of an accident.

### WARNING - Refueling dangers

Automotive fuels are flammable materials. When refueling, please note the following guidelines carefully. Failure to follow these guidelines may result in severe personal injury, severe burns or death by fire or explosion.

- Read and follow all warning posted at the gas station facility.
- Before refueling note the location of the Emergency Gasoline Shut-Off, if available, at the gas station facility.
- Before touching the fuel nozzle, you should eliminate potentially dangerous static electricity discharge by touching another metal part of the vehicle, a safe distance away from the fuel filler neck, nozzle, or other gas source. (Continued)

### (Continued)

- Do not get back into a vehicle once you have begun refueling since you can generate static electricity by touching, rubbing or sliding against any item or fabric (polvester, satin, nylon, etc.) capable of producing static electricity. Static electricity discharge can ignite fuel vapors resulting in rapid burning. If you must reenter the vehicle, you should once again eliminate potentially dangerous static electricity discharge by touching a metal part of the vehicle, away from the fuel filler neck, nozzle or other gasoline source.
- When using an approved portable fuel container, be sure to place the container on the ground prior to refueling. Static electricity discharge from the container can ignite fuel vapors causing a fire. Once refueling has begun, contact with the vehicle should be maintained until the filling is complete.

(Continued)

#### (Continued)

Use only portable plastic fuel containers designed to carry and store gasoline.

- Do not use cellular phones while refueling. Electric current and/or electronic interference from cellular phones can potentially ignite fuel vapors causing a fire.
- When refueling, always shut the engine off. Sparks produced by electrical components related to the engine can ignite fuel vapors causing a fire. Once refueling is complete, check to make sure the filler cap and filler door are securely closed, before starting the engine.
- DO NOT use matches or a lighter and DO NOT SMOKE or leave a lit cigarette in your vehicle while at a gas station especially during refueling. Automotive fuel is highly flammable and can, when ignited, result in fire.

(Continued)

#### (Continued)

• If a fire breaks out during refueling, leave the vicinity of the vehicle, and immediately contact the manager of the gas station and then contact the local fire department. Follow any safety instructions they provide.

### .! CAUTION

- Make sure to refuel your vehicle according to the "Fuel requirements" suggested in section 1.
- If the fuel filler cap requires replacement, please make sure that you use parts designed for replacement in your vehicle. An incorrect fuel filler cap can result in a serious malfunction of the fuel system or emission control system. For more detailed information, we recommend that you contact an authorized HYUNDAI dealer.
- Do not spill fuel on the exterior surfaces of the vehicle. Any type of fuel spilled on painted surfaces may damage the paint.
- After refueling, make sure the fuel cap is installed securely to prevent fuel spillage in the event of an accident.

# PANORAMA SUNROOF (IF EQUIPPED)



If your vehicle is equipped with a sunroof, you can slide or tilt your sunroof with the sunroof control lever located on the overhead console.

The sunroof can only be opened, closed, or tilted when the ignition switch is in the ON position.

# **\* NOTICE**

- In cold and wet climates, the sunroof may not work properly due to freezing conditions.
- After a vehicle is washed or in a rainstorm be sure to wipe off any water that is on the sunroof before operating it.

# A WARNING

- Never adjust the sunroof or sunshade while driving. This could result in loss of control and an accident that may cause death, serious injury, or property damage.
- Make sure heads, other body parts or objects are out of the way before using the sunroof.
- Do not extend your head, arms or body outside the sunroof while driving, to avoid serious injury.
- Do not leave the engine running and the key in your vehicle with unsupervised children.

Unattended children could operate the sunroof, which could result in serious injury.

- The panorama sunroof is made of glass, subject to break in case of accident. Passengers without the appropriate protection(e.g. seat belt, CRS, etc.) on may project out through the broken glasses and get seriously injured or even result in death.
- Do not sit on the top of the vehicle. It may cause injuries or vehicle damage.

# ! CAUTION

- Do not continue to move the sunroof control lever after the sunroof is fully opened, closed, or tilted. Damage to the motor or system components could occur.
- Make sure the sunroof is closed fully when leaving your vehicle.

If the sunroof is open, rain or snow may leak through the sunroof and wet the interior as well as allow theft.



#### Sunshade

- To open the sunshade, pull the sunroof control lever backward to the first detent position.
- To close the sunshade when the sunroof glass is closed, push the sunroof control lever forward.

To stop the sliding at any point, pull or push the sunroof control lever momentarily.



# Sliding the sunroof

#### When the sunshade is closed

If you pull the sunroof control lever backward to the second detent position, the sunshade will slide all the way open then the sunroof glass will slide all the way open. To stop the sunroof movement at any point, pull or push the sunroof control lever momentarily.

#### When the sunshade is opened

If you pull the sunroof control lever backward, the sunroof glass will slide all the way open. To stop the sunroof movement at any point, pull or push the sunroof control lever momentarily.



# Tilting the sunroof

#### When the sunshade is closed

If you push the sunroof control lever upward, the sunshade will slide all the way open then the sunroof glass will tilt. To stop the sunroof movement at any point, pull or push the sunroof control lever momentarily.

#### When the sunshade is opened

If you push the sunroof control lever upward, the sunroof glass will tilt.

To stop the sunroof movement at any point, pull or push the sunroof control lever momentarily.

### **Closing the sunroof**

*To close the sunroof glass only* Push the sunroof control lever forward to the first detent position or pull the lever downward.

To close the sunroof glass with the sunshade

Push the sunroof control lever forward to the second detent position. The sunroof glass will close then the sunshade close automatically.

To stop the sunroof movement at any point, pull or push the sunroof control lever momentarily.



01F04921

#### Automatic reverse

If an object or part of the body is detected while the sunroof glass or sunshade is closing automatically, it will reverse the direction, and then stop.

The auto reverse function does not work if a tiny obstacle is between the sliding glass or sunshade and the sunroof sash. You should always check that all passengers and objects are away from the sunroof before closing it.

# A WARNING

Small objects that can get caught between the sunroof glass and the front glass channel may not be detected by the automatic reverse system. In this case, the sunroof glass will not detect the object and will not reverse direction.

# A WARNING - Sunroof

- Be careful that no head, hands and body parts are obstructed by a closing sunroof.
- Do not extend the face, neck, arms or body outside the sunroof while driving.
- Make sure your hands and head are safely out of the way before closing a sunroof.

- Periodically remove any dirt that may accumulate on the guide rail.
- If you try to open the sunroof when the temperature is below freezing or when the sunroof is covered with snow or ice, otherwise the glass or the motor could be damaged.

### Resetting the sunroof

Sunroof needs to be reset if (in the followings)

- Battery is discharged or disconnected or the related fuse has been replaced or disconnected
- The one-touch sliding function of the sunroof does not normally operate
- 1. Turn the ignition switch to the ON position.
- 2. Close the sunshade and sunroof completely if opened.
- 3. Release the sunroof control lever.
- 4. Push the sunroof control lever forward in the direction of close (about 10 seconds) until the sunroof moves a little. Then, release the lever.
- 5. Push the sunroof control lever forward in the direction of close, until the sunroof operates as follows again:

SUNSHADE OPEN  $\rightarrow$  TILT OPEN  $\rightarrow$  SLIDE OPEN  $\rightarrow$  SLIDE CLOSE  $\rightarrow$  SUNSHADE CLOSE

Then, release the lever.

When this is complete, the sunroof system has been reset.

### **\* NOTICE**

If you do not reset the sunroof, it may not work properly.

## **DRIVER POSITION MEMORY SYSTEM (IF EQUIPPED)**



**A** WARNING

Never attempt to operate the driver position memory system while the vehicle is moving.

This could result in loss of control, and an accident causing death, serious injury, or property damage.

## Storing positions into memory using the buttons on the door

Storing driver's seat positions

- 1. Change the ignition switch to the ON position.
- 2. Adjust the driver's seat comfortable for the driver.
- 3. Press SET button on the control panel. The system will beep once.
- Press one of the memory buttons (1 or 2) within 5 seconds after pressing the SET button. The system will beep twice when memory has been successfully stored.

A driver position memory system is provided to store and recall the driver seat position with a simple button operation. By saving the desired position into the system memory, different drivers can reposition the driver seat based upon their driving preference. If the battery is disconnected, the position memory will be erased and the driving position should be restored in the system.

#### Recalling positions from memory

- 1. Change the ignition switch to the ON position.
- To recall the position in the memory, press the desired memory button (1 or 2). The system will beep once, then the driver's seat will automatically adjust to the stored position.

Adjusting the control switch for the driver's seat while the system is recalling the stored position will cause the movement to stop and move in the direction that the control switch is moved.

## A WARNING

Use caution when recalling the adjustment memory while sitting in the vehicle. Push the seat position control switch to the desired position immediately if the seat moves too far in any direction.

## Easy access function (if equipped)

The system will move the driver's seat automatically as follows:

- Without smart key system
  - It will move the driver's seat rearward when the ignition key is removed and the driver's door is open.
  - It will move the driver's seat forward when the ignition key is inserted.
- · With smart key system
  - It will move the driver's seat rearward when the engine start/stop button is changed to the OFF position and the driver's door is open.
  - It will move the driver's seat forward when the engine start/stop button is changed to the ACC or START position.

You can activate or deactivate this feature. Refer to "User setting" in this section.

### **STEERING WHEEL**

#### Electronic power steering (EPS)

Power steering uses the motor to assist you in steering the vehicle. If the engine is off or if the power steering system becomes inoperative, the vehicle may still be steered, but it will require increased steering effort.

The motor driven power steering is controlled by the power steering control unit which senses the steering wheel torque and vehicle speed to command the motor.

The steering wheel becomes heavier as the vehicle's speed increases and becomes lighter as the vehicle's speed decreases for better control of the steering wheel.

Should you notice any change in the effort required to steer during normal vehicle operation, we recommend that the system be checked by authorized HYUNDAI dealer.

## **\* NOTICE**

The following symptoms may occur during normal vehicle operation:

- The steering effort is high immediately after turning the ignition switch on. This happens as the system performs the EPS system diagnostics. When the diagnostics is completed, the steering wheel will return to its normal condition.
- A click noise may be heard from the EPS relay after the ignition switch is turned to the ON or LOCK/OFF position.
- Motor noise may be heard when the vehicle is at a stop or at a low driving speed.
- When you operate the steering wheel in low temperature, abnormal noise could occur. If temperature rises, the noise will disappear. This is a normal condition.

(Continued)

#### (Continued)

• When the vehicle is stationary, if you turn the steering wheel all the way to the left or right continuously, the steering wheel effort increases. This is not a system malfunction. As time passes, the steering wheel effort will return to its normal condition.

If the Electronic Power Steering System does not operate normally, the warning light will illuminate on the instrument cluster. The steering wheel may become difficult to control or operate abnormally. We recommend that you contact an authorized HYUNDAI dealer.

#### **Tilt steering**

A tilt steering wheel allows you to adjust the steering wheel before you drive. You can also raise it to give your legs more room when you exit and enter the vehicle.

The steering wheel should be positioned so that it is comfortable for you to drive, while permitting you to see the instrument panel warning lights and gauges.

## A WARNING

- Never adjust the angle and height of steering wheel while driving. You may lose your steering control and cause severe personal injury or accidents.
- After adjusting, push the steering wheel both up and down to be certain it is locked in position.



To change the steering wheel angle, pull down the lock release lever (1), adjust the steering wheel to the desired angle (2) and height (3), then pull up the lockrelease lever to lock the steering wheel in place. Be sure to adjust the steering wheel to the desired position before driving.



## Heated steering wheel (if equipped)

With the ignition switch in the ON position, pressing the heated steering wheel button warms the steering wheel. The indicator on the button will illuminate and notify you on the LCD display.

To turn the heated steering wheel off, press the button once again. The indicator on the button will turn off and notify you on the LCD display.

### **\* NOTICE**

The heated steering wheel will turn off automatically approximately 30 minutes after the heated steering wheel is turned on.

## ! CAUTION

Do not install any grip to operate the steering wheel. This causes damage to the heated steering wheel system.



### Horn

To sound the horn, press the horn symbol on your steering wheel.

Check the horn regularly to be sure it operates properly.

## **\* NOTICE**

To sound the horn, press the area indicated by the horn symbol on your steering wheel (see illustration). The horn will operate only when this area is pressed.

## .! CAUTION

Do not strike the horn severely to operate it, or hit it with your fist. Do not press on the horn with a sharppointed object.

## **MIRRORS**

#### Inside rearview mirror

Adjust the rearview mirror so that the center view through the rear window is seen. Make this adjustment before you start driving.

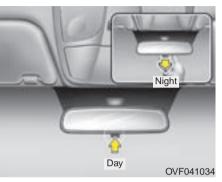
A WARNING - Rear visibility Do not place objects in the rear seat or cargo area which would interfere with your vision out the rear window.

## A WARNING

Do not adjust the rearview mirror while the vehicle is moving. This could result in loss of control, and an accident which could cause death, serious injury or property damage.

## A WARNING

Do not modify the inside mirror and do not install a wide mirror. It could result in injury, during an accident or deployment of the air bag.



## Day/night rearview mirror (if equipped)

Make this adjustment before you start driving and while the day/night lever is in the day position.

Pull the day/night lever toward you to reduce glare from the headlights of vehicles behind you during night driving.

Remember that you lose some rearview clarity in the night position.

## Electric chromic mirror (ECM) (if equipped)

The electric rearview mirror automatically controls the glare from the headlights of the car behind you in nighttime or low light driving conditions. The sensor mounted in the mirror senses the light level around the vehicle, and automatically controls the headlight glare from vehicles behind you.

When the engine is running, the glare is automatically controlled by the sensor mounted in the rearview mirror.

Whenever the shift lever is shifted into R (Reverse), the mirror will automatically go to the brightest setting in order to improve the drivers view behind the vehicle.

## ! CAUTION

When cleaning the mirror, use a paper towel or similar material dampened with glass cleaner. Do not spray glass cleaner directly on the mirror as that may cause the liquid cleaner to enter the mirror housing.



#### To operate the electric rearview mirror:

- Press the ON/OFF button (1) to turn the automatic dimming function on. The mirror indicator light will illuminate. Press the ON/OFF button to turn the automatic dimming function off. The mirror indicator light will turn off.
- The mirror defaults to the ON position whenever the ignition switch is turned on.

#### Outside rearview mirror

Be sure to adjust mirror angles before driving.

Your vehicle is equipped with both lefthand and right-hand outside rearview mirrors. The mirrors can be adjusted remotely with the remote switch. The mirror heads can be folded back to prevent damage during an automatic car wash or when passing in a narrow street.

### A WARNING - Rearview mirrors

- The outside rearview mirror is convex. Objects seen in the mirror are closer than they appear.
- Use your interior rearview mirror or direct observation to determine the actual distance of following vehicles when changing lanes.

## .! CAUTION

Do not scrape ice off the mirror face; this may damage the surface of the glass. If ice should restrict movement of the mirror, do not force the mirror for adjustment. To remove ice, use a deicer sprav, or a sponge or soft cloth with very warm water.

## .! CAUTION

If the mirror is jammed with ice, do not adjust the mirror by force. Use an approved spray de-icer (not radiator antifreeze) to release the frozen mechanism or move the vehicle to a warm place and allow the ice to melt.

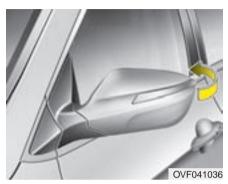
## **A** WARNING

Do not adjust or fold the outside rearview mirrors while the vehicle is moving. This could result in loss of control, and an accident which could cause death, serious injury or property damage.



## ! CAUTION

- The mirrors stop moving when they reach the maximum adjusting angles, but the motor continues to operate while the switch is pressed. Do not press the switch longer than necessary, the motor may be damaged.
- Do not attempt to adjust the outside rearview mirror by hand. Doing so may damage the parts.



Folding the outside rearview mirror Manual type

To fold outside rearview mirror, grasp the housing of mirror and then fold it toward the rear of the vehicle.

## Remote control

#### Electric type

The electric remote control mirror switch allows you to adjust the position of the left and right outside rearview mirrors. To adjust the position of either mirror, move the lever (1) to R (Right) or L (Left) to select the right side mirror or the left side mirror, then press a corresponding point on the mirror adjustment control to position the selected mirror up, down, left or right.

After adjustment, put the lever into neutral (center) position to prevent inadvertent adjustment.



## **!** CAUTION

In case it is an electric type outside rearview mirror, don't fold it by hand. It could cause motor failure.

#### **Electric type**

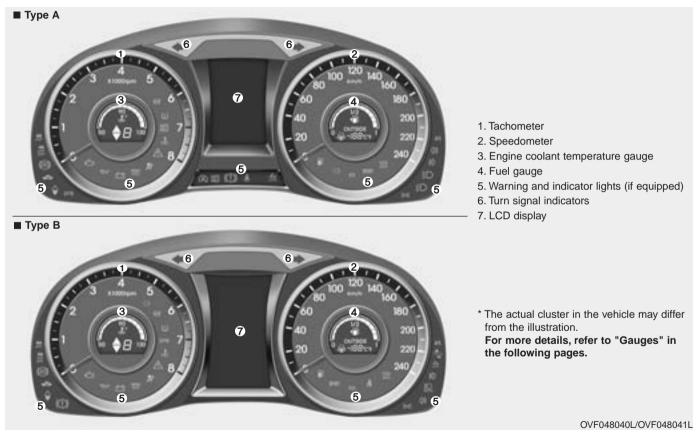
To fold the outside rearview mirror, press the button.

To unfold it, press the button again.

## ! CAUTION

The electric type outside rearview mirror operates even though the ignition switch is in the OFF position. However, to prevent unnecessary battery discharge, do not adjust the mirrors longer than necessary while the engine is not running.

## **INSTRUMENT CLUSTER**





### Instrument panel illumination

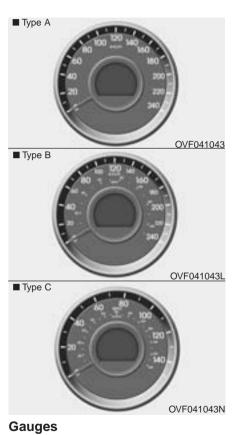
The instrument panel illumination intensity can be adjusted as follows:

- Ignition switch in the ON position
- Parking light or headlight on
- Pushing the control switch up or down

The illumination intensity is shown on the instrument cluster LCD display.

## A WARNING

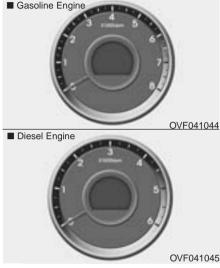
Never adjust the instrument cluster while driving. This could result in loss of control and lead to an accident that may cause death, serious injury, or property damage.



#### Speedometer

The speedometer indicates the vehicle speed.

The speedometer is calibrated in kilometers per hour and/or miles per hour.

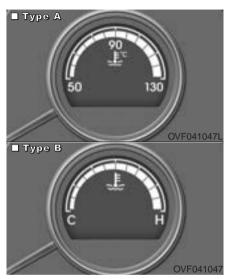


#### Tachometer

The tachometer indicates the engine speed in revolutions per minute (rpm). Use the tachometer to select the correct shift points and to prevent lugging and/or over-revving the engine.

## ! CAUTION

Do not operate the engine within the tachometer's RED ZONE. This may cause severe engine damage.



*Engine coolant temperature gauge* This gauge shows the temperature of the engine coolant when the ignition switch is ON.

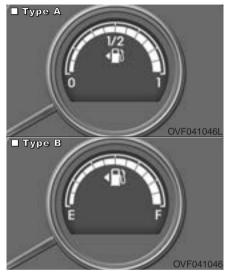
Do not continue driving with an overheated engine. If your vehicle overheats, refer to "If the engine overheats" in section 6.

## ! CAUTION

If the gauge pointer moves beyond the normal range area toward the "130/H" position, it indicates overheating that may damage the engine.

## A WARNING

Never remove the radiator cap when the engine is hot. The engine coolant is under pressure and could cause severe burns. Wait until the engine is cool before adding coolant to the reservoir.



#### Fuel gauge

The fuel gauge indicates the approximate amount of fuel remaining in the fuel tank.

## **\* NOTICE**

- The fuel tank capacity is given in section 8.
- The fuel gauge is supplemented by a low fuel warning light, which will illuminate when the fuel tank is nearly empty.
- On inclines or curves, the fuel gauge pointer may fluctuate or the low fuel warning light may come on earlier than usual due to the movement of fuel in the tank.

## **A** WARNING - Fuel gauge

Running out of fuel can expose vehicle occupants to danger. You must stop and obtain additional fuel as soon as possible after the warning light comes on or when the gauge indicator comes close to the "O/E (Empty)" level.

## ! CAUTION

Avoid driving with a extremely low fuel level. Running out of fuel could cause the engine to misfire damaging the catalytic converter.



### **Outside temperature**

The current outside temperature is displayed in 1°C (1°F) increments. The temperature range is between -40°C ~ 60°C (-40°F ~ 140°F).

- The outside temperature on the display may not change immediately like a general thermometer to prevent the driver from being inattentive.
- To convert from °C to °F or °F to °C press the (1) button for more than 5 seconds in the Distance to empty (DTE) mode.



### Transaxle shift indicator

Manual transaxle shift indicator (if equipped)

This indicator informs you which gear is desired while driving to save fuel.

For example

- ▲ ∃: Indicates that shifting up to the 3rd gear is desired (currently the shift lever is in the 2nd or 1st gear).
- ▼∃: Indicates that shifting down to the 3rd gear is desired (currently the shift lever is in the 4th or 5th gear).

When the system is not working properly, the indicator is not displayed.



*Dual Clutch Transmission Shift Indicator (if equipped)* This indicator displays which shift lever is selected.

- Park : P
- Reverse : R
- Neutral : N
- Drive : D
- Sports Mode : D1, D2, D3, D4, D5, D6, D7



## Icy road warning light (if equipped)

This warning light is to warn the driver the road may be icy when:

- Ignition ON
- Temperature range: approximately below 4°C (39.2°F).

The warning light will blink for 10 seconds and then illuminate. Also, the warning chime will sound.

## **\* NOTICE**

If the icy road warning light appears while driving, you should drive more attentively and safely refraining from over-speeding, rapid acceleration, sudden braking or sharp turning, etc.



OVF045050K

### LCD display

The Trip computer, User setting, Warnings, etc. are displayed on the LCD display.

To change between groups, press the (1) button.

To change between modes in groups, press the (1) button.

## Trip computer

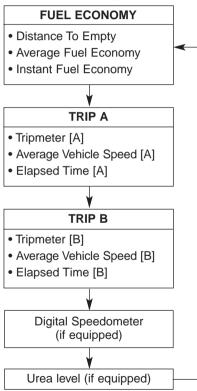
The trip computer is a microcomputercontrolled driver information system that displays information related to driving.

## **\* NOTICE**

Some driving information stored in the trip computer (for example Average Vehicle Speed) resets if the battery is disconnected.

#### Trip modes

To change the trip mode, select the " $\mathbf{\nabla}$ " button on the steering wheel.





Trip A/B (km or mile, km/h or MPH) Tripmeter (1)

- The tripmeter is the total driving distance since the last tripmeter reset.
  - Distance range: 0.0 ~ 9999.9 km or mi.

• To reset the tripmeter, press the [▼] button on the steering wheel for more than 1 second when the tripmeter is displayed.

Average Vehicle Speed (2)

- The average vehicle speed is calculated by the total driving distance and driving time since the last average vehicle speed reset.
  - Speed range: 0 ~ 999 km/h or MPH
- To reset the average vehicle speed, press the [▼] button on the steering wheel for more than 1 second when the average vehicle speed is displayed.

## **\* NOTICE**

- The average vehicle speed is not displayed if the driving distance is less than 300 meters (0.19 miles) or the driving time is less than 10 seconds since the ignition switch or the Engine Start/Stop button is turned to ON.
- Even if the vehicle is not in motion, the average vehicle speed keeps calculating while the engine is running.

#### Elapsed Time (3)

- The elapsed time is the total driving time since the last elapsed time reset.
   Time range (hh:mm): 00:00 ~ 99:59
- To reset the elapsed time, press the [▼] button on the steering wheel for more than 1 second when the elapsed time is displayed.

## **\* NOTICE**

Even if the vehicle is not in motion, the elapsed time keeps calculating while the engine is running.



Fuel economy (km or mile, L/100km, km/L or MPG)

#### **Distance To Empty (1)**

- The distance to empty is the estimated distance the vehicle can be driven with the remaining fuel.
  - Distance range: 1 ~ 9999 km or 1 ~ 9999 mi.

• If the estimated distance is below 1 km (1 mi.), the trip computer will display "---" as distance to empty.

### **\* NOTICE**

- If the vehicle is not on level ground or the battery power has been interrupted, the distance to empty function may not operate correctly.
- The distance to empty may differ from the actual driving distance as it is an estimate of the available driving distance.
- The trip computer may not register additional fuel if less than 6 liters (1.6 gallons) of fuel are added to the vehicle.
- The fuel economy and distance to empty may vary significantly based on driving conditions, driving habits, and condition of the vehicle.

#### **Average Fuel Economy (2)**

• The average fuel economy is calculated by the total driving distance and fuel consumption since the last average fuel economy reset.

- Fuel economy range:

- 0.0 ~ 99.9 L/100km, km/L or MPG
- The average fuel economy can be reset when the [♥] button is pressed on the steering wheel for more than 1 second.
- The average fuel economy can be reset after 4 hours when the ignition switch or smart key is in the OFF position.
- The average fuel economy will be cleared to zero (---) when the vehicle speed exceeds 1 km/h after refueling more than 6 liters (1.6 gallons).

## **\* NOTICE**

The average fuel economy is not displayed for more accurate calculation if the vehicle does not drive more than 10 seconds or 300 meters (0.19 miles) since the ignition switch or the Engine Start/Stop button is turned to ON.

#### 4 72

### Instant Fuel Economy (3)

- This mode displays the instant fuel economy during the last few seconds when the vehicle speed is more than 10 km/h (6.2 MPH).
  - Fuel economy range: 0 ~ 30 L/100km, km/L or 0 ~ 50 MPG



Digital Speedometer (km/h or MPH) (if equipped)

This message shows the speed of the vehicle (km/h, MPH).

### Urea level gauge (for diesel engine, if equipped)

This mode displays the amount of the remaining urea solution in the urea solution tank.

## User settings mode

On this mode, you can change setting of the instrument cluster, doors, lamps, and so on.

### **Driver Assistance (if equipped)**

Items	Explanation
Lane Safety	<ul> <li>Lane Departure Warning / Standard LKA / Active LKA</li> <li>To adjust the sensitivity of the Lane Keeping Assist System.</li> <li>For more information, refer to the "Lane Keeping Assist (LKA) system" in chapter 5.</li> </ul>
Forward Collision-Avoidance Assist	To activate or deactivate the Forward Collision-Avoidance Assist (FCA). For more information, refer to "Forward Collision-Avoidance Assist (FCA) system" in chapter 5.
Forward Collision Warning	- Early/Normal/Late To adjust the initial warning alert time for Forward Collision-Avoidance Assist (FCA) system. For more information, refer to "Forward Collision-Avoidance Assist (FCA) system" in chapter 5.
Speed Limit Warning	The information of speed limit is shown on the LCD display

### Door/Trunk/Tailgate

Items	Explanation
Auto Lock	<ul> <li>Disable: The auto door lock operation will be deactivated.</li> <li>Enable on Speed: All doors will be automatically locked when the vehicle speed exceeds 15km/h (9.3mph).</li> <li>Enable on Shift: All doors will be automatically locked if the automatic transaxle shift lever is shifted from the P (Park) position to the R (Reverse), N (Neutral), or D (Drive) position.</li> </ul>
Auto Unlock	<ul> <li>Disable: The auto door unlock operation will be canceled.</li> <li>On Key Out/Vehicle off: All doors will be automatically unlocked when the ignition key is removed from the ignition switch or the Engine Start/Stop button is set to the OFF position.</li> <li>On Shift to P: All doors will be automatically unlocked if the automatic transaxle shift lever is shifted to the P (Park) position.</li> </ul>
Smart Tailgate/Smart Trunk	To activate or deactivate the Smart Tailgate/Smart Trunk system. For more details, refer to "Smart Tailgate/Smart Trunk" in this chapter.

### Lights

Items	Explanation
	<ul> <li>On: The head lamp delay function will be activated.</li> <li>Off: The headlamp delay function will be deactivated.</li> <li>For more details, refer to "Lighting" in this chapter.</li> </ul>
Travel Mode	If this item is checked, the traffic change function will be activated. For more details, refer to "Lighting" in this chapter.

### Sound

Items	Explanation
Welcome Sound	<ul> <li>Off : The welcome sound function will be deactivated.</li> <li>On : The welcome sound function will be activated.</li> </ul>

### Convenience

Items	Explanation
Seat Easy Access	<ul> <li>None: The seat easy access function will be deactivated.</li> <li>Normal/Extended: <ul> <li>When you turn off the engine, the driver's seat will automatically move rearward short (Normal) or long (Extended) for you to enter or exit the vehicle more comfortably.</li> <li>If you change the Engine Start/Stop button from OFF position to the ACC, ON, or START position, the driver's seat will return to the original position.</li> </ul> </li> <li>For more details, refer to "Driver Position Memory System" in this chapter.</li> </ul>

#### Service interval

Items	Explanation
Service Interval	On this mode, you can activate the service interval function with mileage (km or mi.) and period (months). • Off : The service interval function will be deactivated. • On :You can set the service interval (mileage and months).

### Other

Items	Explanation
	<ul> <li>Off : The average fuel economy will not reset automatically whenever refueling.</li> <li>After Refueling : The average fuel economy will reset automatically when refueling.</li> <li>For more details, refer to "Trip Computer" in this chapter.</li> </ul>
Fuel Economy Unit	Choose the fuel economy unit. (Km/L, L/100)
Language	Choose the language.

## Features of your vehicle

#### LCD display informations **Clock (if equipped)**



OVF041065

The time is displayed when the ignition switch is in the ON position.

#### • Time format mode



To change the 12 hour format to 24 hour format:

- 1. Press the TIME button for more than 1second.
- 2. Press the final button to switch from 12H to 24H or 24H to 12H.
- 3. Press the ▼ button to select the time format you desire.

• Time adjust mode



OVF045131K/Q

To change the time (hour/minute) :

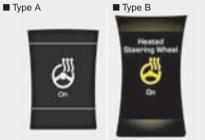
- 1. Press the **v** button when in the time format mode.
- 2. Press the 🗊 button to change the hour (advance by 1 hour).
- 3. Press the V button to move the minute.
- 4. Press the 🗊 button to change the time by 1 minute (advance by 1 minute).
- 5. Press the ▼ button to move out of the Time mode.

#### Door/Trunk (Tailgate) open



The indicator appears to inform the driver which door or tailgate/trunk is opened.

### Heated steering wheel ON/OFF



OVF045068L

The indicator will appear when the heated steering wheel is turned on.

Type A



OVF045069L

The indicator will appear when the heated steering wheel is turned off.

For more details, refer to "Steering wheel" in section 4.

## Features of your vehicle

#### **Illumination intensity**

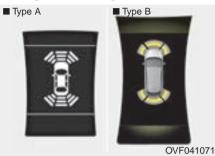


OVF041070

The illumination intensity of the instrument panel is shown when adjusting it with the illumination control switch.

For more details, refer to "Instrument panel illumination" in section 4.

#### Parking assist warning



Displays the area an obstacle is detected while moving forward or rearward.

For more details, refer to "Parking assist system" in section 4.

#### Low tire pressure (if equipped)

The low tire pressure position telltale will appear when one or more of your tires are under-inflated. It will indicate the corresponding under-inflated tire.

For more details, refer to "TPMS" in section 6.

#### Turn on FUSE SWITCH (mode switch)

The notice appears to inform the driver to turn on the fuse switch in the instrument panel under the steering wheel.

For more details, refer to "Fuses" in section 7.

#### Check active air flap system

The notice appears to inform the driver when:

- The flaps malfunction
- The active air flap controller malfunctions
- The air flaps are not opened in a condition that has to be opened

When all of the above conditions are fixed, the warning will disappear.

## **\* NOTICE**

- The above warning message may appear even though the active air flap has not malfunctioned. Please check for foreign matter or if the flap has frozen.
- In winter, the warning may not illuminate immediately.

#### Warning messages (if equipped) Key not in vehicle

If the smart key is not in the vehicle and if any door is opened or closed with the engine start/stop button in the ACC, ON, or START position, the warning illuminates on the LCD display. Also, the chime sounds for 5 seconds when the smart key is not in the vehicle and the door is closed.

Always have the smart key with you.

#### Key not detected

If the smart key is not in the vehicle or is not detected and you press the engine start/stop button, the warning illuminates on the LCD display for 10 seconds. Also, the immobilizer indicator blinks for 10 seconds.

#### Press start button with key

If you press the engine start/stop button while the warning "Key not detected" illuminates the warning "Press the start button with key" illuminates for 10 seconds on the LCD display. Also, the immobilizer indicator blinks for 10 seconds.

#### Low key battery

If the engine start/stop button changes to the OFF position when the smart key in the vehicle discharges, the warning illuminates on the LCD display for about 10 seconds. Also, the warning chime sounds once.

Replace the battery with a new one.

#### Press brake pedal to start engine (for Dual clutch transmission)

If the engine start/stop button changes to the ACC position twice by pressing the button repeatedly without depressing the brake pedal, the warning illuminates on the LCD display for about 10 seconds to indicate that you should depress the brake pedal to start the engine.

## Press clutch pedal to start engine (for manual transaxle)

If the engine start/stop button turns to the ACC position twice by pressing the button repeatedly without depressing the clutch pedal, the warning illuminates on the LCD display for about 10 seconds to indicate that you should depress the clutch pedal to start the engine.

#### Shift to P position

If you try to turn off the engine without the shift lever in the P (Park) position, the engine start/stop button will turn to the ACC position. If the button is pressed once more it will turn to the ON position. The warning illuminates on the LCD display for about 10 seconds to indicate that you should press the engine start/stop button with the shift lever in the P (Park) position to turn off the engine.

Also, the warning chime sounds for about 10 seconds. (if equipped)

#### Press start button again

If you can not operate the engine start/stop button when there is a problem with the engine start/stop button system, the warning illuminates for 10 seconds and the chime sounds continuously to indicate that you could start the engine by pressing the engine start/stop button once more.

The chime will stop if the engine start/stop button system works normally or the theft alarm system is armed.

If the warning illuminates each time you press the engine start/stop button, we recommend that you have the vehicle inspected by an authorized HYUNDAI dealer.

#### Shift to P or N to start engine

If you try to start the engine with the shift lever not in the P(Park) or N(Neutral) position, the warning illuminates for about 10 seconds on the LCD display. You can also start the engine with the shift lever in the N(Neutral) position, but for your safety start the engine with the shift lever in the P(Park) position.

## Press START button while turning wheel (if equipped)

If the steering wheel does not unlock normally when the engine start/stop button is pressed, the warning illuminates for 10 seconds on the LCD display. Also, the warning chime sounds once and the engine start/stop button light blinks for 10 seconds.

When you are warned, press the engine start/stop button while turning the steering wheel right and left.

## Check Steering Wheel Lock System (if equipped)

If the steering wheel does not lock normally when the engine start/stop button changes to the OFF position, the warning illuminates for 10 seconds on the LCD display. Also, the warning chime sounds for 3 seconds and the engine start/stop button light blinks for 10 seconds.

#### **Check BRAKE SWITCH fuse**

When the stop lamp fuse is disconnected, the warning illuminates for 10 seconds on the LCD display.

Replace the fuse with a new one. If that is not possible you can start the engine by pressing the engine start/stop button for 10 seconds in ACC.

## Check High Beam Assist (HBA) system (if equipped)

This warning message is displayed if there is a problem with the High Beam Assist (HBA) System. We recommend that you have the vehicle inspected by an authorized HYUNDAI dealer.

For more information, refer to "High Beam Assist (HBA) System" in this chapter.

#### Check Forward Collision-Avoidance Assist (FCA) system (if equipped)

This warning message is displayed if there is a malfunction with the Forward Collision-Avoidance Assist (FCA) system. We recommend that you have the vehicle inspected by an authorized HYUNDAI dealer.

For more details, refer to "Forward Collision-Avoidance Assist (FCA) system" in chapter 5.

## Check Lane Keeping Assist (LKA) system (if equipped)

This warning message is displayed if there is a problem with the Lane Keeping Assist (LKA) system. We recommend that you have the vehicle inspected by an authorized HYUNDAI dealer.

For more details, refer to "Lane Keeping Assist (LKA) system" in chapter 5.

#### Check exhaust system (if equipped)

This warning message illuminates if the DPF or GPF system has a malfunction. In this case, we recommend that you have the DPF or GPF system checked by an authorized HYUNDAI dealer. DPF : Diesel Particulate Filter GPF : Gasoline Particulate Filter

#### Low urea (for diesel engine)

This warning message illuminates if the urea solution level in the urea solution tank is nearly empty.

- When the SCR warning light is illuminates.

Refill urea solution as soon as possible.

For more details, refer to "Low urea solution warning message" in the chapter 7.

#### Check urea system (for diesel engine)

This warning message illuminates if the urea system has a malfunction.

In this case, we recommend that you have the urea system checked by an authorized HYUNDAI dealer.

For more details, refer to "Low urea solution warning message" in the chapter 7.

## Check Electronic Control Suspension (ECS) system (if equipped)

This warning message illuminates if there is a malfunction with the Electronic Control Suspension (ECS) system. We recommend that the vehicle be inspected by an authorized HYUNDAI dealer.

# For more details, refer to "Electronic Control Suspension (ECS)" in chapter 5.

#### \* NOTICE - ECS Warning Message

When there is a malfunction with the Electronic Stability Control (ESC), the Electronic Control Suspension (ECS) warning message may illuminate as well as the Electronic Stability Control (ESC) Indicator Light.

## Warnings and indicators (Instrument cluster)

All warning lights are checked by turning the ignition switch ON (do not start the engine). If any light that does not illuminate, we recommend that the system be checked by an authorized HYUNDAI dealer.

After starting the engine, check to make sure that all warning lights are off. If any are still on, this indicates a situation that needs attention.

The following warning and indicators are introduced in the previous pages.

- Manual transaxle shift indicator
- · Icy road warning
- Door/tailgate (or trunk) open (LCD display)
- Heated steering wheel ON/OFF (LCD display)
- Parking Distance Warning (Reverse/Forward) (LCD display)
- Low tire pressure (LCD display)

Seat belt warning and chime light

belt fastening.

belt" in section 3.

As a reminder to the driver, the seat belt

warning light will blink or illuminate for

approximately 6 seconds each time you

turn the ignition switch ON regardless of

For more details, refer to the "Seat



Air bag warning light



This warning light will illuminate for approximately 6 seconds each time you turn the ignition switch to the ON position.

This light also comes on when the SRS is not working properly. If the SRS air bag warning light does not come on, or continuously remains on after operating for about 6 seconds when you turned the ignition switch to the ON position or started the engine, or if it comes on while driving, we recommend that the system be inspected by an authorized HYUNDAI dealer.

4 84

Immobilizer indicator



#### Without smart key system

This indicator illuminates when the immobilizer key is inserted and turned to the ON position to start the engine.

At this time, you can start the engine. The indicator goes out after the engine is running.

If this indicator blinks when the ignition switch is in the ON position before starting the engine, we recommend that the system be checked by an authorized HYUNDAI dealer.

#### With smart key system

If any of the following occurs in a vehicle equipped with the smart key, the immobilizer indicator illuminates, blinks or goes off.

- When the smart key is in the vehicle, if the engine start/stop button is in the ACC or ON position, the indicator will illuminate for approximately 30 seconds to indicate that you are able to start the engine. However, when the smart key is not in the vehicle, if the engine start/stop button is pressed, the indicator will blink for a few seconds to indicate that you are not be able to start the engine.
- If the indicator illuminates only for 2 seconds and goes out when the engine start/stop button is turned to ON position with the smart key in the vehicle, we recommend that the system be checked by an authorized HYUNDAI dealer.
- When the battery is weak, if the engine start/stop button is pressed, the indicator will blink and you are not able to start the engine. However, you are able to start the engine by pressing the engine start/stop button directly with the smart key. Also, if the smart key system related parts have a problem, the indicator will blink.

Low fuel level warning



This warning light indicates the fuel tank is nearly empty. When it comes on, you should add fuel as soon as possible. Driving with the fuel level warning light on or with the fuel level below "O/E" can cause the engine to misfire and damage the catalytic converter (if equipped).

EPS (Electronic Power Steering) system warning light



This indicator light comes on after the ignition key is turned to the ON position and then it will go out.

This light also comes on when the EPS has some problems. If it comes on while driving, we recommend that the system be checked by an authorized HYUNDAI dealer.

Turn signal indicator lights



The blinking green arrows on the instrument panel show the direction indicated by the turn signals. If the arrow comes on but does not blink, blinks more rapidly than normal, or does not illuminate at all, a malfunction in the turn signal system is indicated. Your dealer should be consulted for repairs. Light on indicator

The indicator illuminates when the tail lights or headlights are ON.

Low Beam Indicator Light (if equipped)

This indicator light illuminates when the headlights are on.

For vehicles equipped with instrument cluster type B, the indicator illuminates on the LCD display.

High beam indicator



This indicator illuminates when the headlights are on and in the high beam position or when the turn signal lever is pulled into the Flash-to-Pass position.



High Beam Assist (HBA) indicator light (if equipped)



This warning light illuminates:

- When the high-beam is on with the light switch in the AUTO light position.
- If your vehicle detects oncoming or preceding vehicles, the High Beam Assist (HBA) system will switch the high beam to low beam automatically.

## For more details, refer to "High Beam Assist (HBA)" in this chapter.

Adaptive Front-Lighting System (AFS) malfunction indicator (if equipped)

AFS

If the AFS malfunction indicator illuminates, the AFS is not working properly. Drive to the nearest safe location and restart the engine. If the indicator continuously remains on, we recommend that the vehicle be inspected by an authorized HYUNDAI dealer. Front fog light indicator (if equipped)



The indicator illuminates when the front fog lights are ON.

Rear fog light indicator (if equipped)



This indicator illuminates when the rear fog lights are ON.

Low washer fluid level warning indicator



This warning light indicates the washer fluid reservoir is nearly empty. Refill the washer fluid as soon as possible. Parking brake & brake fluid warning

#### Parking brake warning

This light illuminates when the parking brake is applied with the ignition switch in the START or ON position. The warning light should go off when the parking brake is released.

#### Low brake fluid level warning

If the warning light remains on, it may indicate that the brake fluid level in the reservoir is low.

If the warning light remains on:

- 1. Drive carefully to the nearest safe location and stop your vehicle.
- 2. With the engine stopped, check the brake fluid level immediately and add fluid as required. Then check all brake components for fluid leaks.
- 3. Do not drive the vehicle if leaks are found, the warning light remains on or the brakes do not operate properly. We recommend that the vehicle be towed to any authorized HYUNDAI dealer for a brake system inspection and necessary repairs.



Your vehicle is equipped with dual-diagonal braking systems. This means you still have braking on two wheels even if one of the dual systems should fail. With only one of the dual systems working, more than normal pedal travel and greater pedal pressure are required to stop the car. Also, the car will not stop in as short a distance with only a portion of the brake system working. If the brakes fail while you are driving, shift to a lower gear for additional engine braking and stop the car as soon as it is safe to do so.

To check bulb operation, check whether the parking brake and brake fluid warning light illuminates when the ignition switch is in the ON position.

## A WARNING

Driving the vehicle with a warning light on is dangerous. If the brake warning light remains on, we recommend that the system be checked by an authorized HYUNDAI dealer. EPB (Electronic Parking Brake) malfunction indicator



The EPB malfunction indicator will illuminate when the ignition switch is turned ON, but should go off after approximately 3 seconds. If the warning light does not come on, or continuously remains on we recommend that the system be checked by an authorized HYUNDAI dealer.

Also, the EPB malfunction indicator may illuminate when the ESC indicator comes on to indicate that the ESC is not working properly, but if this occurs, it does not indicate the EPB has malfunctioned.

For more details, refer to "EPB" in section 5.

AUTO HOLD indicator (if equipped)

to green.

HYUNDAI dealer.

HOI D" in section 5.

If you press the AUTO HOLD switch, the

AUTO HOLD indicator on the cluster

comes on white. And when you stop the

vehicle completely by pressing the brake

pedal, the indicator changes from white

If the AUTO HOLD malfunction indicator

lights up vellow, the AUTO HOLD is not

working properly. We recommend that

the system be checked by an authorized

For more details, refer to "AUTO

AUTO Anti-lock brake system (ABS) warning light



This light illuminates if the ignition switch is turned ON and goes off in approximately 3 seconds if the system is operating normally.

If the ABS warning light remains on, comes on while driving, or does not come on when the ignition switch is turned to the ON position, this indicates that there may be a problem with the ABS.

If this occurs, we recommend that the system be checked by an authorized HYUNDAI dealer. The normal braking system will still be operational, but without the assistance of the anti-lock brake system.

Electronic brake force distribution (EBD) system warning light



If two warning lights illuminate at the same time while driving, your vehicle's ABS and EBD system may have malfunctioned.

In this case, your ABS and regular brake system may not work normally. We recommend that the system be checked by an authorized HYUNDAI dealer.

### **\* NOTICE**

If the ABS warning light or EBD warning light is on and stays on, the speedometer or odometer/tripmeter may not work. Also, the EPS warning light may illuminate and the steering effort may increase or decrease. In this case, we recommend that the system be checked by an authorized HYUNDAI dealer.

## A WARNING

If both ABS and Brake warning lights are on and stay on, your vehicle's brake system will not work normally. So you may experience an unexpected and dangerous situation during sudden braking. In this case, avoid high speed driving and abrupt braking.

In this case, we recommend that the system be checked by an authorized HYUNDAI dealer. ESC (Electronic Stability Control) indicator



The ESC indicator will illuminate when the ignition switch is turned ON, but should go off after approximately 3 seconds. When the ESC is on, it monitors the driving conditions. Under normal driving conditions, the ESC indicator will remain off. When a slippery or low traction condition is encountered, the ESC will operate, and the ESC indicator will blink to indicate the ESC is operating.

But, if the ESC system malfunctions the indicator illuminates and stays on. We recommend that the system be checked by an authorized HYUNDAI dealer.

ESC OFF indicator



The ESC OFF indicator will illuminate when the ignition switch is turned ON, but should go off after approximately 3 seconds. To switch to ESC OFF mode, press the ESC OFF button. The ESC OFF indicator will illuminate indicating the ESC is deactivated. Auto stop indicator (if equipped)



This indicator will illuminate when the engine enters the Idle Stop mode of the ISG (Idle Stop and Go) system.

When the automatic starting occurrs, the auto stop indicator on the cluster will blink for 5 seconds.

## For more details, refer to the ISG (Idle Stop and Go) system in section 5.

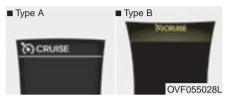
For vehicles equipped with instrument cluster type B, the indicator illuminates on the LCD display.

## **\* NOTICE**

When the engine automatically starts by the ISG system, some warning lights (ABS, ESC, ESC OFF, EPS or Parking brake warning light) may turn on for a few seconds.

This happens because of low battery voltage. It does not mean the system is malfunctioning.

## Cruise indicator (if equipped) CRUISE indicator



The indicator illuminates when the cruise control system is enabled by pressing O/CRUISE button on the steering wheel. The indicator goes off when the O/CRUISE button is pressed again to deactivate the system.

#### **Cruise SET indicator**



The indicator illuminates when the cruise control switch (-SET or RES+) is pressed.

The cruise SET indicator does not illuminate when the cruise control switch (CANCEL) is pushed or the system is disengaged.

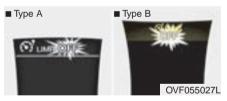
For more details, refer to "Cruise control system" in section 5.

The cruise indicators illuminates on the LCD display.

Speed limiter indicator (if equipped)



The indicator illuminates when the speed limit control system is enabled by pressing (S)<sup>\*</sup> button on the steering wheel. The indicator goes off when the (S)<sup>\*</sup> button is pressed again to deactivate the system.



If there is a problem with the speed limit control system, the "OFF" indicator will blink.

If this occurs, we recommend that the system be checked by an authorized HYUNDAI dealer.

## For more details, refer to "Speed limit control system" in section 5.

The speed limiter indicators illuminates on the LCD display.

LKA (Lane Keeping Assist) system indicator (if equipped)



The LKA indicator will illuminate when you turn the lane keeping assistant system on by pressing the LKA button. If there is a problem with the system, the yellow LKA indicator will illuminate.

For more details, refer to "LKA" in section 5.

Forward Collision-Avoidance Assist (FCA) system warning light (if equipped)



#### This indicator light illuminates:

- When you set the ignition switch or Engine Start/Stop button to the ON position.
  - It illuminates for approximately 3 seconds and then goes off.
- When there is a malfunction with the FCA.

In this case, we recommend that you have the vehicle inspected by an authorized HYUNDAI dealer.

For more information, refer to "Forward Collision-Avoidance Assist (FCA) system" in chapter 5. TPMS (Tire Pressure Monitoring System) indicator (if equipped)

Low tire pressure telltale/ TPMS malfunction indicator



The low tire pressure telltale comes on for 3 seconds after the ignition switch is turned to the ON position.

The low tire pressure and position telltales illuminates when one or more of your tires is significantly underinflated.

The TPMS malfunction indicator will illuminate after it blinks for approximately one minute when there is a problem with the Tire Pressure Monitoring System.

If this occurs, we recommend that the system be checked by an authorized HYUNDAI dealer.

## For more details, refer to the TPMS in section 6.

The low tire pressure position telltale illuminates on the LCD display.

### A WARNING - Safe stopping

- The TPMS cannot alert you to severe and sudden tire damage caused by external factors.
- If you notice any vehicle instability, immediately take your foot off the accelerator pedal, apply the brakes gradually and with light force, and slowly move to a safe position off the road.

Engine oil pressure warning



This warning light indicates the engine oil pressure is low.

If the warning light illuminates while driving:

- 1. Drive safely to the side of the road and stop.
- 2. With the engine off, check the engine oil level. If the level is low, add oil as required.

If the warning light remains on after adding oil or if oil is not available, we recommend that you call an authorized HYUNDAI dealer.

### ! CAUTION

If the engine does not stop immediately after the engine oil pressure warning light is illuminated, severe damage could result.

### ! CAUTION

If the oil pressure warning light stays on while the engine is running, serious engine damage may result. The oil pressure warning light comes on whenever there is insufficient oil pressure. In normal operation, it should come on when the ignition switch is turned on, then go out when the engine is started. If the oil pressure warning light stays on while the engine is running, there is a serious malfunction.

If this happens, stop the car as soon as it is safe to do so, turn off the engine and check the oil level. If the oil level is low, fill the engine oil to the proper level and start the engine again. If the light stays on with the engine running, turn the engine off immediately. In any instance where the oil light stays on when the engine is running, we recommend that the system be checked by an authorized HYUNDAI dealer. Engine oil level warning light (if equipped)

The engine oil level warning light illuminates when the engine oil level should be checked.

If the warning light comes on, check the engine oil level as soon as possible and add engine oil as required.

Slowly pour the recommended oil little by little into a funnel. (Oil refill capacity : approximately  $0.6 \sim 1.0 l$ )

Use only the specified engine oil. (Refer to "Recommended lubricants and capacities" in section 8.)

Do not overfill the engine oil to ensure the oil level is not above F mark on the dipstick.

For vehicles equipped with instrument cluster type B, the indicator illuminates on the LCD display.

### **\*** NOTICE

- If you travel approximately 50 km~100 km after the engine warms up, after adding the engine oil, the warning light will go off.
- Cycle the ignition from OFF to ON 3 times within 10 seconds, the warning light will go off immediately. However, when you turn off the warning light without adding the engine oil, the light will come on again after traveling approximately 50 km ~ 100 km after the engine warms up.

### ! CAUTION

If the light comes on continuously after adding the engine oil and traveling approximately 50 km~100 km after the engine warms up, we recommend that the system be checked by an authorized HYUNDAI dealer.

Even if this light doesn't come on after the engine has started, the engine oil should be checked and supplied periodically. Malfunction indicator lamp (MIL) (check engine light)



This indicator light is part of the Engine Control System which monitors various emission control system components. If this light illuminates while driving, it indicates that a potential problem has been detected somewhere in the emission control system.

This light will also illuminate when the ignition switch is turned to the ON position, and will go out in a few seconds after the engine is started. If it illuminates while driving, or does not illuminate when the ignition switch is turned to the ON position, we recommend that the system be checked by an authorized HYUNDAI dealer.

Generally, your vehicle will continue to be drivable, we recommend that the system be checked by an authorized HYUNDAI dealer promptly.

### **CAUTION**

Prolonged driving with the Emission Control System Malfunction Indicator Light illuminated may cause damage to the emission control systems which could effect drivability and/or fuel economy.

! CAUTION - Gasoline engine If the Emission Control System Malfunction Indicator Light illuminates, potential catalytic converter damage is possible which could result in loss of engine power. We recommend that the Engine Control System be inspected by an authorized HYUNDAI dealer as soon as possible.

### .! CAUTION - Diesel engine (if equipped with DPF)

When the malfunction indicator light illuminates. it may turn-off after driving the vehicle at more than 60km/h (37 mph) or at more than second gear with 1500 ~ 2500 engine rpm for a certain time (for about 25 minutes). If the malfunction indicator light continues to blink in spite of the procedure, we recommend that the DPF system be checked by an authorized HYUNDAI dealer. If you continue to drive with the malfunction indicator light blinking for a long time, the DPF system can be damaged and fuel consumption can worsen.

! CAUTION - Diesel engine If the Emission Control System Malfunction Indicator Light blinks, some error related to the injection quantity adjustment occurs which could result in loss of engine power, combustion noise and poor emission. We recommend that the Engine Control System be inspected by an authorized HYUNDAI dealer as soon as possible. Engine coolant temperature warning light (if equipped)



The warning light illuminates if the temperature of the engine coolant is above  $120\pm3^{\circ}C$  ( $248\pm5.4^{\circ}F$ ).

Do not continue driving with an overheated engine. If your vehicle overheats, refer to "Overheating" in section 6.

### **\* NOTICE**

If the engine coolant temperature warning light illuminates, it indicates overheating that may damage the engine. Glow indicator (Diesel engine)

The indicator light illuminates when the ignition switch is placed at the ON position. The engine can be started after the preheat indicator light goes off. The illuminating time varies with the water temperature, air temperature and battery condition.

### **\* NOTICE**

If the engine does not start within 10 seconds after the preheating is completed, turn the ignition key once more to the LOCK/OFF position for 10 seconds, and then to the ON position, in order to preheat again.

### ! CAUTION

If the preheat indicator light continues to illuminate or flash on and off after the engine has warmed up or while driving, we recommend that the system be checked by an authorized HYUNDAI dealer as soon as possible.



Fuel filter warning light (Diesel engine)



This warning light illuminates for 3 seconds after the ignition switch is set to the ON position and then it will go out. If it lights up while the engine is running, it indicates that water has accumulated inside the fuel filter. If this happens, remove the water from the fuel filter.

For more details, refer to "Fuel filter" in section 7.

### ! CAUTION

When the fuel filter warning light illuminates, engine power (vehicle speed & idle speed) may decrease. If you keep driving with the warning light on, you can damage your vehicle's engine parts and injection system of the Common Rail. If this occurs, we recommend that the system be checked by an authorized HYUNDAI dealer. Exhaust System (DPF) Warning Light (for diesel engine, if equipped)



This warning light illuminates:

- When there is a malfunction with the Diesel Particulate Filter (DPF) system.
   When this warning light illuminates, it may turn off after driving the vehicle:
  - at more than 60 km/h (37 mph), or
  - above 2nd gear with 1500 ~ 2500 engine rpm for a certain time (for about 25 minutes).

If this warning light blinks in spite of the procedure (at this time LCD warning message will be displayed), we recommend that you have the DPF system checked by an authorized HYUNDAI dealer.

### **\* NOTICE**

If you continue to drive with the DPF warning light blinking for a long time, the DPF system can be damaged and fuel consumption can worsen. SCR warning light (Diesel Engine, if equipped)



### This warning light illuminates:

• When the urea solution tank is nearly empty.

If the urea solution tank is nearly empty:

• Refill urea solution as soon as possible.

For more details, refer to "Low urea solution warning message" in the chapter 7.

Charging system warning



This warning light indicates a malfunction of either the generator or electrical charging system.

If the warning light comes on while the vehicle is in motion:

- 1. Drive to the nearest safe location.
- 2. With the engine off, check the generator drive belt for looseness or breakage.
- 3. If the belt is adjusted properly, a problem exists somewhere in the electrical charging system. We recommend that the system be checked by an authorized HYUNDAI dealer.

Overspeed warning (if equipped)

### **Overspeed warning light**

If you drive with the speed of 120 km/h or more, the overspeed warning light will blink. This is to prevent you from driving your vehicle with overspeed.

120

km/h

### Overspeed warning chime (if equipped)

If you drive with the speed of 120 km/h or more, the overspeed warning chime will sound for about 5 seconds. This is to prevent you from driving your vehicle with overspeed. SPORT Mode Indicator Light (if equipped)

SPORT

### This indicator light illuminates

• When you select "SPORT" mode as drive mode.

For more details, refer to "Drive Mode Integrated Control System" in chapter 5.

ECO Mode Indicator Light (if equipped)

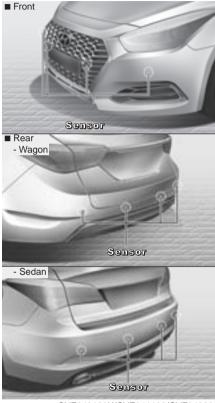
ECO

### This indicator light illuminates

• When you select "ECO" mode as drive mode.

For more details, refer to "Drive Mode Integrated Control System" in chapter 5.

### PARKING DISTANCE WARNING (REVERSE/FORWARD) SYSTEM (IF EQUIPPED)



OVF048103K/OVF041100/OVF048338

The Parking Distance Warning (Reverse /Forward) system assists the driver during movement of the vehicle by chiming if any object is sensed within the distance of 100 cm (39 in.) in front and 120 cm (47 in.) behind the vehicle. This system is a supplemental system and it is not intended to nor does it replace the need for extreme care and attention of the driver. The sensing range and objects detectable by the sensors are limited. Whenever moving pay as much attention to what is in front and behind of you as you would in a vehicle without a Parking Distance Warning (Reverse/Forward) system.

### A WARNING

The Parking Distance Warning (Reverse/Forward) system should only be considered as a supplementary function. The driver must check the front and rear view. The operational function of the parking assist system can be affected by many factors and conditions of the surroundings, so the responsibility rests always with the driver.



### Operation of the Parking Distance Warning (Reverse/Forward) system

**Operating condition** 

- This system activates when the Parking Distance Warning (Reverse/ Forward) system button is pressed with the ignition switch ON.
- The indicator of the Parking Distance Warning (Reverse/Forward) system button turns on automatically and activates the Parking Distance Warning (Reverse/Forward) system when you shift the gear to the R (Reverse) position or press the PA button. It will turn off automatically when you drive above 20 km/h (12.4 mph), 30 km/h (18.6 mph). (If equipped with PA)

- The sensing distance while backing up is approximately (front : 100 cm (39 in.), rear : 120 cm (47 in.)) when you are driving less than 10 km/h (6.2 mph).
- The sensing distance while moving forward is approximately 60 cm (24 in.) when you are driving less than 10 km/h (6.2 mph).
- When more than two objects are sensed at the same time, the closest one will be recognized first.

### **\* NOTICE**

It may not operate if it's distance from the object is already less than approximately 25 cm when the system is ON. Type of warning indicator and sound

: with Warning sound

Distance from object		Warning indicator		Warning sound
		When driving forward	When driving rearward	warning sound
100cm~61cm	Front	Ā	-	Buzzer beeps intermittently
120cm~61cm	Rear	-	8	Buzzer beeps intermittently
60cm~31cm	Front			Buzzer beeps frequently
	Rear	-		Buzzer beeps frequently
30cm	Front			Buzzer sounds continuously
	Rear	-		Buzzer sounds continuously

### **\*** NOTICE

- The actual warning sound and indicator may differ from the illustration according to objects or sensor status.
- Do not wash the vehicle's sensor with high pressure water.

### ! CAUTION

 This system can only sense objects within the range and location of the sensors;

It can not detect objects in other areas where sensors are not installed. Also, small or slim objects, such as poles or objects located between sensors may not be detected by the sensors.

Always visually check behind the vehicle when backing up.

• Be sure to inform any drivers of the vehicle that may be unfamiliar with the system regarding the systems capabilities and limitations.

### Non-operational conditions of Parking Distance Warning (Reverse/Forward) system

Parking Distance Warning (Reverse/Forward) system may not operate normally when:

- 1. Moisture is frozen to the sensor. (It will operate normally when moisture melts.)
- Sensor is covered with foreign matter, such as snow or water, or the sensor cover is blocked. (It will operate normally when the material is removed or the sensor is no longer blocked.)
- 3. Sensor is stained with foreign matter such as snow or water. (Sensing range will return to normal when removed.)
- 4. The Parking Distance Warning (Reverse/ Forward) system button is off.

### There is a possibility of Parking Distance Warning (Reverse/Forward) system malfunction when:

- 1. Driving on uneven road surfaces such as unpaved roads, gravel, bumps, or gradient.
- 2. Objects generating excessive noise such as vehicle horns, loud motorcycle engines, or truck air brakes can interfere with the sensor.
- 3. Heavy rain or water spray.
- 4. Wireless transmitters or mobile phones present near the sensor.
- 5. Sensor is covered with snow.

### Detecting range may decrease when:

- 1. Outside air temperature is extremely hot or cold.
- 2. Undetectable objects smaller than 1 m and narrower than 14 cm in diameter.

The following objects may not be recognized by the sensor:

- 1. Sharp or slim objects such as ropes, chains or small poles.
- 2. Objects, which tend to absorb sensor frequency such as clothes, spongy material or snow.

### **\* NOTICE**

- 1. The warning may not sound sequentially depending on the speed and shapes of the objects detected.
- 2. The Parking Distance Warning (Reverse/Forward) system may malfunction if the vehicle bumper height or sensor installation has been modified. Any non-factory installed equipment or accessories may also interfere with the sensor performance.
- 3. Sensor may not recognize objects less than 30 cm from the sensor, or it may sense an incorrect distance. Use with caution.
- 4. When the sensor is frozen or stained with snow or water, the sensor may be inoperative until the stains are removed using a soft cloth.
- 5. Do not push, scratch or strike the sensor with any hard objects that could damage the surface of the sensor. Sensor damage could occur.

### **\* NOTICE**

This system can only sense objects within the range and location of the sensors, it can not detect objects in other areas where sensors are not installed. Also, small or slim objects, or objects located between sensors may not be detected. Always visually check in front and behind the vehicle when driving. Be sure to inform any drivers in the vehicle that may be unfamiliar with the system regarding the systems capabilities and limitations.

### **A** WARNING

Pay close attention when the vehicle is driven close to objects on the road, particularly pedestrians, and especially children. Be aware that some objects may not be detected by the sensors, due to the objects distance, size or material, all of which can limit the effectiveness of the sensor. Always perform a visual inspection to make sure the vehicle is clear of all obstructions before moving the vehicle in any direction.

### Self-diagnosis

When you shift the gear to the R (Reverse) position and if one or more of the below occurs you may have a malfunction in the Parking Distance Warning (Reverse/Forward) system.

• You don't hear an audible warning sound or if the buzzer sounds intermittently.



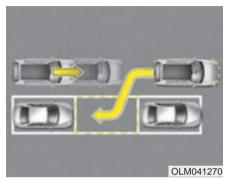
is displayed. (if equipped)

If this occurs, we recommend that the system be checked by an authorized HYUNDAI dealer.

### A WARNING

Your new vehicle warranty does not cover any accidents or damage to the vehicle or injuries to its occupants related to a parking assist system. Always drive safely and cautiously.

### PARKING ASSIST (PARALLEL) (IF EQUIPPED)



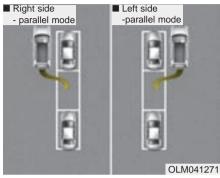
The Parking Assist System helps drivers park their vehicle by using sensors to measure parallel parking spaces, control the steering wheel to semi-automatically park the car and provide instruction on the LCD display to help through parking.

### **\* NOTICE**

- The vehicle will not stop for pedestrians or objects that may be in its path, so the driver must monitor the maneuver.
- Use the system only in parking lots and places used for parking.
- The system does not work if there is no car parked in front of the parking space you are planning to park or if it is a diagonal parking space.
- After parking your vehicle using the system, the vehicle may not be parked at the exact spot you have wished. For example, the space between your vehicle and wall may not be the distance you have desired.
- Deactivate the system and park your vehicle manually, when the situation requires parking manually.
- The Parking Distance Warning (Reverse/Forward) system's front and rear warning sound activates when the Parking Assist System is activated.
- After searching for a parking space is completed, the Parking Assist System will be canceled if the Parking Distance Warning (Reverse/Forward) system is cancelled by pressing the button to the OFF position.

### A WARNING

- The Parking Assist System should only be considered as a supplementary function. The driver must check the front and rear view for objects. The operational function of the Smart Parking Assist System can be affected by many factors and conditions of the surroundings, so the responsibility rests always with the driver.
- The system may not operate normally if the vehicle needs wheel alignment adjustment. We recommend that the system be checked by an authorized HYUNDAI dealer.
- If you use a different tire or wheel size rather than the size recommended by the HYUNDAI dealer, the system may not work properly. Always use the same size tire and wheel.



### **Operating condition**

The system will help park the vehicle in the middle or back of a parked vehicle. Use the system when all the below conditions are met.

- When the parking space is a straight line
- When parallel parking is required
- When there is a parked vehicle
- When there is enough space to move the vehicle

### Non-operating condition

Never use the Parking Assist System in the below conditions.

- · Curved parking space
- · Inclined roads
- A vehicle loaded with longer or wider cargo compared to the vehicle
- Diagonal parking space
- Parking space with trash, grass or barriers
- · Heavy snow or rain
- · A pole close to the parking line
- · Bumpy roads
- A vehicle equipped with a snow chain or spare tire
- Tire pressure lower or higher than the standard tire pressure
- A trailer connected to the vehicle
- · Slippery or uneven road
- Big vehicles such as buses or trucks parked
- Sensor covered with foreign matter, such as snow or water
- Moisture frozen on the sensor.
- · A motorcycle or bicycle parked
- A trash can or obstacle near

- · Heavy wind
- Wheel changed to an unauthorized size
- A problem with the wheel alignment
- Next to a garden or bush

### A WARNING

Do not use the Parking Assist System in the following conditions for unexpected results may occur and cause a serious accident. 1. Parking on inclines



The driver must apply the accelerator and brake pedal when parking on inclines. If the driver is unfamiliar with applying the accelerator and brake pedal, a car accident may occur.

(Continued)

### (Continued) 2. Parking in snow



Snow may interfere with sensor operation or the system may cancel if the road is slippery while parking. Also, if the driver is unfamiliar with applying the accelerator and brake pedal, a car accident may occur.

(Continued)

### (Continued) 3. Parking in narrow space



The system may not search for parking spaces if the space is too narrow. Even if it operates always be careful.

(Continued)



parallel parking. Diagonal line parking is not available. Even if the vehicle is able to enter the space, do not operate the Parking Assist System. The system will attempt parallel parking.

(Continued)

(Continued) 5. Parking in uneven road



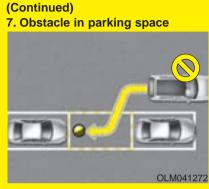
Parking in uneven roads, the driver needs to properly apply the pedal (clutch, accelerator or brake). If not, the system may cancel when the vehicle slips or an accident may occur.

(Continued)

(Continued) 6. Parking behind a truck



ing behind a vehicle higher than yours. For example, bus, truck, etc. (Continued)



The system may search for a parking space even though an obstacle is in the parking space. An accident may occur if you continue to park the vehicle with the system.

Do not solely rely on the Smart Parking Assist System.

### How the system works

- 1. Activate the Parking Assist System
- 2. Select parking assist mode
- 3. Search for parking space (slowly move forward.)
- 4. Search complete (automatic search by sensor.)
- 5. Steering wheel control
  - (1) Shift according to the instruction on the LCD display.
  - (2) Drive slowly with the brake pedal applied.
- 6. Parking Assist System complete
- 7. If necessary, manually adjust position of vehicle.

### **\* NOTICE**

- Before activating the system check if the conditions are possible to use the system.
- For your safety, always apply the brake pedal except for when driving.

### Features of your vehicle



1. Activate Parking Assist System

- Press the Parking Assist System button (the button indicator will illuminate).
- The Parking Assist System will be activated (the button indicator will illuminate).

A warning sound will be heard if an obstacle is detected.

- Press the Parking Assist System button again for more than 2 seconds to turn off the system.
- The Parking Assist System defaults to the OFF position whenever the ignition switch is turned on.

Right side - parallel mode





- 2. Select parking assist mode
- Select the parking assist mode by pressing the Parking Assist System button with the shift lever in N (Neutral) or D(Drive) and the brake pedal depressed.
- The right side parallel mode is selected automatically when the Parking Assist System is activated.
- To select the left side parallel mode press the Parking Assist System button once more.
- If the button is pressed again, the system will turn off.



OVF045389L

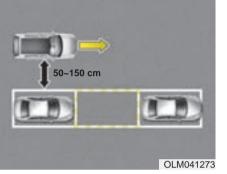
- 3. Search for parking space
- Slowly drive forward maintaining the distance of approximately 50cm ~ 150cm (19.6in.~59.0in.) with the parked vehicles. The side sensors will search for a parking space.
- If the vehicle speed is over 20km/h (12.4mph), a message will appear to notify to reduce speed.
- If the vehicle speed is over 30km/h (18.6mph), the system will cancel.

### **\* NOTICE**

- Turn on the hazard warning flasher if it is crowded with other vehicles.
- If the parking lot is small, slowly drive more nearer to the parking space.
- The search for a parking space will be completed only when there is enough space for the vehicle to move to park.

### **\* NOTICE**

- When searching for a parking space, the system may not be able to find a parking space if there is no vehicle parked, a parking space is available after driving by or a parking space is available before driving by.
- The system may not operate normally in the following conditions:
  - (1) When the sensors are frozen
  - (2) When the sensors are dirty
  - (3) When it snows or rains heavily
  - (4) When a pillar or object is near



### **\* NOTICE**

Slowly drive forward maintaining the distance of approximately  $50 \text{cm} \sim 150 \text{cm}$  (19.6in.~59.0in.) with the parked vehicles. If not within the distance, the system may not be able to search for a parking space.

### ! CAUTION

After searching for a parking space is completed, continue using the system after checking the surrounding area.



### ! CAUTION

While using the Parking Assist System if the Auto Hold activates the above message will appear. Turn the Auto Hold operation off. When you cancel the Auto Hold operation by depressing the accelerator pedal, always check the surrounding area near your vehicle.



# Check surroundings, beck up slowly

### 4. Search complete

While driving forward to search for a parking space, the above message will appear with a beep sound if the search is complete. Stop the vehicle and shift to the R (Reverse) position.

### **!** CAUTION

- Always drive slowly with the brake pedal applied.
- If the parking space is to small the system may be cancelled at the Steering wheel control stage. Do not park your vehicle if the space is too small.

- 5. Steering wheel control
- The above message will appear if the shift lever is in R (Reverse). The steering wheel will be controlled automatically.
- The system will be cancelled if you firmly hold the steering wheel while it is controlled automatically.
- The system will be cancelled if vehicle speed is over 7km/h(4.3mph).

### A WARNING

Do not put your hands between the steering wheel while it is being automatically controlled.

### ! CAUTION

- Always drive slowly with the brake pedal applied.
- Always check for objects around your vehicle before driving.
- If the vehicle does not move even though the brake pedal is not depressed, check the surrounding before depressing the accelerator pedal. Be sure not to speed over 7km/h(4.3mph).

### **\* NOTICE**

• If you do not follow the instructions provided, you may fail to park your vehicle.

However, if the Parking Assist System warning sound (distance from object is within 30cm: continuous beep) occurs, slowly drive the vehicle to the reverse direction of the detected object after checking the surrounding.

• Always check the surrounding before driving your vehicle if the Parking Assist System warning sound (distance from object is within 30cm: continuous beep) is heard for the object is close to your vehicle. To cancel the system while parking Press the Parking Assist System button or turn the steering wheel to the left or right.



Gear shift while steering wheel control When the above message appears with a beep sound, shift the gear and drive the vehicle with the brake pedal depressed. **! CAUTION** Always check the surrounding before releasing the brake pedal.

### **A** WARNING

Always be careful while parking for other vehicles or pedestrians.



6. Parking Assist System completed Complete parking your vehicle according to the instructions on the LCD display. If required, manually control the steering wheel and complete parking your vehicle.

### **\* NOTICE**

The brake pedal must be depressed by the driver while parking your vehicle.

The system may be cancelled in the below conditions:

- Ignoring the gear shift message and drive the vehicle approximately 150cm (59in).
- The front and rear Parking Assist System warning sound (distance from object is within 30cm: continuous beep) is heard at the same time.
- 6 minutes have passed since the vehicle has been controlled by the Parking Assist System.
- The shift lever is changed to the P (Park) or R (Reverse) position while searching for parking space.



### Additional instructions(messages)

When the Parking Assist System is operating, a message may appear regardless of the parking order.

The messages will appear according to the circumstances. Follow the instructions provided while parking your vehicle with the Parking Assist System.

### **\* NOTICE**

- In the below conditions the system will be cancelled. Park your vehicle manually.
  - 1. Search for parking space
  - When the ABS/ESC is activated
  - When the vehicle speed is over 40km/h (24.8mph)
  - When you press the Parking Assist System button (the front and rear Parking Distance Warning (Reverse/ Forward) system operates)
  - When you shift the shift lever to R (Reverse)
  - 2. Steering wheel control
  - When the ABS/ESC is activated
  - When the vehicle speed is over 7km/h (4.3 mph)
  - When you press the Parking Assist System button (the Parking Distance Warning (Reverse/ Forward) system operates)
  - When you shift the shift lever to D (Drive) before entering the parking space
  - When you hold the steering wheel firmly

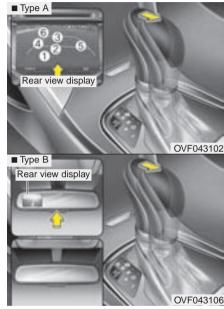


### System malfunction

- If there is a problem with the system, when the system is turned on, the above message will appear. Also, the indicator on the button will not light up and a beep sound will be heard 3 times.
- If there is a problem with only the Parking Assist System, the Parking Distance Warning (Reverse/Forward) system will operate after 2 seconds.

If you notice any problem, we recommend that the system be checked by an authorized HYUNDAI dealer.

# REAR VIEW MONITOR (IF EQUIPPED)



The rear view monitor will activate when the back-up light is ON with the ignition switch ON and the shift lever in the R (Reverse) position.

### Туре А

- Red line (①) : Approximately 50cm from the rear bumper of the vehicle
- Yellow line (2): Approximately 100cm from the rear bumper of the vehicle
- Yellow line (③) : Approximately 300cm from the rear bumper of the vehicle
- The left side of the yellow line (④) : Trace of the left wheel of the vehicle
- The right side of the yellow line (⑤) : Trace of the right wheel of the vehicle
- Blue line (6) : Neutral trace of steering

### Туре В

The rear view monitor may be turned off by pressing the ON/OFF button when the rear view monitor is activated.

To turn the rear view monitor on again, press the ON/OFF button again when the ignition switch is on and the shift lever in R (Reverse). Also, the rear view monitor will turn on automatically whenever the ignition switch is turned off and on again.

### **\* NOTICE**

The warning "Warning! Check surroundings for safety " will appear on the rearview display when the rear view monitor is activated.

### A WARNING

- This system is a supplementary function only. It is the responsibility of the driver to always check the inside/outside rearview mirror and the area behind the vehicle before and while backing up because there is a dead zone that cannot be seen through the rear view monitor.
- Always keep the camera lens clean. If the lens is covered with foreign matter, the camera may not operate normally.

### HAZARD WARNING FLASHER



The hazard warning flasher should be used whenever you find it necessary to stop the car in a hazardous location. When you must make such an emergency stop, always pull off the road as far as possible.

The hazard warning lights are turned on by pushing in the hazard switch. This causes all turn signal lights to blink. The hazard warning lights will operate even though the key is not in the ignition switch.

To turn the hazard warning lights off, push the switch a second time.

### LIGHTING

### **Battery saver function**

- The purpose of this feature is to prevent the battery from being discharged. The system automatically turns off the parking lights when the driver removes the ignition key and opens the driver- side door.
- With this feature, the parking lights will be turned off automatically if the driver parks on the side of road at night.

If necessary, to keep the lights on when the ignition key is removed, perform the following :

- 1) Open the driver-side door.
- 2) Turn the parking lights OFF and ON again using the light switch on the steering column.

# Headlamp delay function (if equipped)

The headlights (and/or taillights) remain on for approximately 5 minutes after the ignition key is removed or turned to the ACC or LOCK position. However, if the driver's door is opened and closed, the headlights are turned off after 15 seconds.

The headlights can be turned off by pressing the lock button on the transmitter or smart key twice or turning off the light switch from the headlight or Auto light position.

### ! CAUTION

If the driver gets out of the vehicle through other doors (except driver's door), the battery saver function does not operate and the headlight escort function does not turn off automatically. Therefore, it causes the battery to be discharged. In this case, make sure to turn off the lamp before getting out of the vehicle.

# Headlight (Headlamp) welcome function (if equipped)

When the headlight switch is in the ON or AUTO position and all doors (and tailgate/trunk) are closed and locked, if you press the door unlock button on the transmitter or smart key, the headlights will come on for about 15 seconds.

If the headlight switch is in the AUTO position, the function can only operate at night.

At this time, if you press the door unlock button again or door lock button on the transmitter or smart key, the headlights will turn off immediately.

### Low Beam Assist - static

While driving the corner, for your sight and safety, the low beam assist - static turns on automatically. The system will operate automatically as follows:

- When vehicle speed is more than 3 km/h less than 10 km/h and steering wheel angle approximately 100 degrees.
- When vehicle speed is more than 10 km/h less than 90 km/h and steering wheel angle approximately 35 degrees.
- When moving rearwards with one of the above conditions satisfied the lights will light up the opposite direction.
- The low beam assist static will operate only when the light switch is in the AUTO position. (vehicles equipped with AFS)



### Lighting control

The light switch has a Headlight and a Parking light position.

To operate the lights, turn the knob at the end of the control lever to one of the following positions:

- (1) OFF position
- (2) Auto light position (if equipped)
- (3) Parking light position
- (4) Headlight position



OVF041122

Parking light position ( <sup>3005</sup>)

When the light switch is in the parking light position, the tail, position, license and instrument panel lights are ON.



OVF041121

### Headlight position ( **ED** )

When the light switch is in the headlight position the head, tail, position, license and instrument panel lights are ON.

### **\* NOTICE**

The ignition switch must be in the ON position to turn on the headlights.



Auto light/AFS position (if equipped)

When the light switch is in the AUTO light position, the taillights and headlights will be turned ON or OFF automatically depending on the amount of light outside the vehicle.

If your vehicle is equipped with the Adaptive front - lighting system (AFS), it will also operate when the headlamp is ON.

### ! CAUTION

- Never place anything over the sensor (1) located on the instrument panel, this will ensure better auto-light system control.
- Don't clean the sensor using a window cleaner, the cleaner may leave a light film which could interfere with sensor operation.
- If your vehicle has window tint or other types of coating on the front windshield, the Auto light system may not work properly.

### Traffic change (for Europe)

Use this function when you visit a country with opposite traffic direction.

If the traffic change is activated when you visit a country with opposite traffic direction, it will decrease the dazzle on oncoming vehicle drivers. Follow the below procedure.

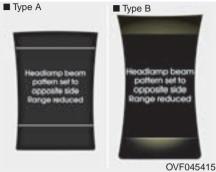


- 1. Select "User Settings" by pressing the mode button (自) on the steering wheel.
- 2. Select "Lights" by pressing the move button (▼) and select button (↓) on the steering wheel.



OVF048414

 Check "Travel Mode" by pressing the move button (▼) and select button (↓) on the steering wheel.



### **\* NOTICE**

If the engine is turned off with the traffic change function activated, and the engine turned on again, the above message will appear. It is to notify the driver the function is activated.

4. To cancel the change, follow the steps 1 to 3 from the previous page.



### High - beam operation

- 1. Turn the light switch to the headlight position.
- 2. Push the lever away from you.

### **\* NOTICE**

- The high-beam indicator will light when the headlight high beams are switched on.
- To prevent the battery from being discharged, do not leave the lights on for a prolonged time while the engine is not running.

### A WARNING

Do not use high beam when there are other vehicles. Using high beam could obstruct the other driver's vision.





### Flashing headlights

Pull the lever towards you. It will return to the normal position when released. The headlight switch does not need to be on to use this flashing feature.

### **\* NOTICE**

It could be broken if you rotate the end of the lever by force.

# High Beam Assist (HBA) (if equipped)

The High Beam Assist is a system that automatically adjusts the headlamp range (switches between high beam and low beam) according to the brightness of other vehicles and road conditions.

### **Operating condition**

- 1. Place the light switch in the AUTO position.
- 2. Turn on the high beam by pushing the lever away from you.

The High Beam Assist (HBA) (♣) indicator will illuminate.

3. The High Beam Assist (HBA) will turn on when vehicle speed is above 45km/h (28 mph).

If the lever is pulled towards you when the High Beam Assist (HBA) is operating, the High Beam Assist (HBA) will turn off.

4. If the light switch is placed to the headlamp position, the High Beam Assist (HBA) will turn off and the low beam will be on continuously.

The high beam switches to low beam in the below conditions.

- When the High Beam Assist (HBA) is off.
- When the light switch is not in the AUTO position.
- When the headlamp is detected from the on-coming vehicle.
- When the tail lamp is detected from the front vehicle.
- When the surrounding is bright enough high beams are not needed.
- When streetlights or other lights are detected.
- When vehicle speed is below 35 km/h (22 mph).

### ! CAUTION

The system may not operate normally in the below conditions.

- When the light from the on-coming or front vehicle is not detected because of lamp damage, hidden from sight, etc.
- When the lamp of the on-coming or front vehicle is covered with dust, snow or water.
- When the light from the on-coming or front vehicle is not detected because of exhaust fume, smoke, fog, snow, etc.
- When the front window is covered with foreign matters such as ice, dust, fog, or is damaged.
- When there is a similar shape lamp with the front vehicle's lamps.
- When it is hard to see because of fog, heavy rain or snow.
- When the headlamp is not repaired or replaced at an authorized dealer.

(Continued)

### (Continued)

- When headlamp aiming is not properly adjusted.
- When driving on a narrow curved road or rough road.
- When driving downhill or uphill.
- When only part of the vehicle in front is visible on a crossroad or curved road.
- When there is a traffic light, reflecting sign, flashing sign or mirror.
- When the road conditions are bad such as being wet or covered with snow.
- When the front vehicle's headlamps are off but the fog lamps on.
- When a vehicle suddenly appears from a curve.
- When the vehicle is tilted from a flat tire or being towed.
- When the LKA (Lane Keeping Assist) system warning light illuminates. (if equipped)

### A WARNING

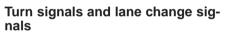
- Do not place any accessories, stickers or tint the windshield.
- Have the windshield glass replaced from an authorized dealer.
- Do not remove or impact related parts of the High Beam Assist (HBA) system.
- Be careful that water doesn't get into the High Beam Assist (HBA) unit.
- Do not place objects on the dashboard that reflects light such as mirrors, white paper, etc. The system may malfunction if sunlight is reflected.
- At times, the High Beam Assist (HBA) system may not work properly, always check the road conditions for your safety. When the system does not operate normally, manually change between the high beam and low beam.



OVF048412/OVF045416

When High Beam Assist (HBA) system is not working properly, the warning message will come on for a few second. After the message disappears, the master warning light will illuminate.

We recommend that the system be checked by an authorized HYUNDAI dealer.



OVF041127

The ignition switch must be on for the turn signals to function. To turn on the turn signals, move the lever up or down (A). Green arrow indicators on the instrument panel indicate which turn signal is operating.

They will self-cancel after a turn is completed. If the indicator continues to flash after a turn, manually return the lever to the OFF position.

To signal a lane change, move the turn signal lever slightly and hold it in position (B). The lever will return to the OFF position when released.

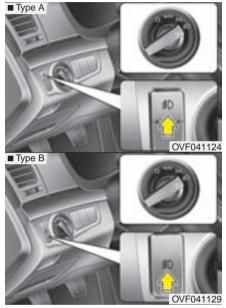
If an indicator stays on and does not flash or if it flashes abnormally, one of the turn signal bulbs may be burned out and will require replacement.

## One-touch lane change function (if equipped)

To activate an one-touch lane change function, move the turn signal lever slightly and then release it. The lane change signals will blink 3 times.

### **\* NOTICE**

If an indicator flash is abnormally quick or slow, bulb may be burned out or have a poor electrical connection in the circuit.



### Front fog light (if equipped)

Fog lights are used to provide improved visibility when visibility is poor due to fog, rain or snow, etc.

- The fog lights will turn on when:
- 1. Park light is on.
- 2. The front fog light switch is on.

### **!** CAUTION

When in operation, the fog lights consume large amounts of vehicle electrical power. Only use the fog lights when visibility is poor.



### Rear fog light (if equipped)

To turn on the rear fog lights, do one of the following:

- Position the light switch in the headlight position and then turn on the rear fog light switch.
- Turn on the front fog light(if equipped) and then turn on the rear fog light switch.

To turn the rear fog lights off, do one of the following:

- Turn off the headlight switch.
- Turn off the rear fog light switch.

### **\* NOTICE**

To turn on the rear fog light switch, the ignition switch must be in the ON position.

# Daytime running light (if equipped)

Daytime Running Lights (DRL) can make it easier for others to see the front of your vehicle during the day. DRL can be helpful in many different driving conditions, and it is especially helpful after dawn and before sunset.

The DRL system will turn off the dedicated lamp when:

- 1. The parklight or headlight (low beam) switch is ON.
- 2. The engine is OFF.
- 3. You turn the turn signal light on.
  - If you turn on the turn signal light, only the corresponding daytime running lights will turn off.
  - If you turn on turn signal light with the position light turned on, the daytime running lights will turn off but the position light remains on.



# Headlight leveling device (if equipped)

### Manual type

To adjust the headlight beam level according to the number of the passengers and the loading weight in the luggage area, turn the beam leveling switch. The higher the number of the switch is positioned, the lower the headlight beam level. Always keep the headlight beam at the proper leveling position, or headlights may dazzle other road users.

Listed below are the examples of proper switch settings. For loading conditions other than those listed below, adjust the switch position so that the beam level may be the nearest as the condition obtained according to the list.

Loading condition	Switch position
Driver only	0
Driver + Front passenger	0
Full passengers (including driver)	1
Full passengers (including driver) + Maximum permissible loading	2
Driver + Maximum permis- sible loading	3

#### Automatic type

It automatically adjusts the headlight beam level according to the number of passengers and loading weight in the luggage area.

And it offers proper headlight beam under various conditions.

### A WARNING

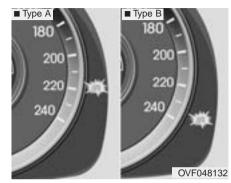
If it does not work properly even though your car is inclined backward according to passenger's posture, or the headlight beam is irradiated to the high or low position, we recommend that the system be inspected by an authorized HYUNDAI dealer.

Do not attempt to inspect or replace the wiring yourself.



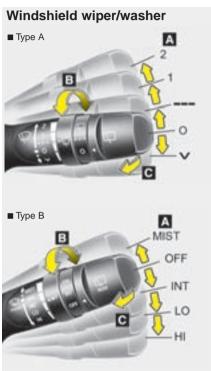
# Adaptive Front-Lighting System (AFS) (if equipped)

Adaptive Front-Lighting System (AFS) uses the steering angle and vehicle speed, to keep your field of vision wide by swiveling and leveling the headlamp. Change the switch to the AUTO position when the engine is running. The adaptive front lighting system will operate when the headlamp is ON. To turn off the AFS, change the switch to other positions. After turning the AFS off, headlamp swiveling no longer occurs, but leveling operates continuously.



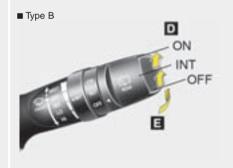
If the AFS malfunction indicator comes on, the AFS is not working properly. Drive to the nearest safe location and restart the engine. If the indicator continuously remains on, we recommend that the system be checked by an authorized HYUNDAI dealer.

### WIPERS AND WASHERS



Rear window wiper/washer (wagon)





OXM049230L/OXM049231L/OAM049048L/OAM049048N

- A : Wiper speed control (front)
  - $\cdot$   $\checkmark$  / MIST Single wipe
  - $\cdot$  O / OFF Off
  - ---- / INT Intermittent wipe AUTO\* – Auto control wipe
  - $\cdot$  1 / LO– Low wiper speed
  - · 1 / LO– Low wiper speed
  - · 2 / HI High wiper speed
- B : Intermittent control wipe time adjustment
- C : Wash with brief wipes (front)\*
- D : Rear wiper/washer control\* · □ / ON – Continuous wipe · --- / INT\* – Intermittent wipe · O / OFF – Off
- E : Wash with brief wipes (rear)
- \* : if equipped

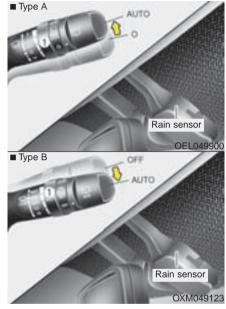
### Windshield wipers

Operates as follows when the ignition switch is turned ON.

- ✓ / MIST : For a single wiping cycle, move the lever to this ( √ / MIST) position and release it. The wipers will operate continuously if the lever is held in this position.
- O / OFF : Wiper is not in operation
- --- / INT : Wiper operates intermittently at the same wiping intervals. Use this mode in light rain or mist. To vary the speed setting, turn the speed control knob.
- 1 / LO : Normal wiper speed
- 2 / HI : Fast wiper speed

### **\* NOTICE**

- If there is heavy accumulation of snow or ice on the windshield, defrost the windshield for about 10 minutes, or until the snow and/or ice is removed before using the windshield wipers to ensure proper operation.
- If you do not remove the snow and/or ice before using the wiper and washer, it may damage the Wiper and washer system.



### Auto control (if equipped)

The rain sensor located on the upper end of the windshield glass senses the amount of rainfall and controls the wiping cycle for the proper interval. The more it rains, the faster the wiper operates. When the rain stops, the wiper stops. To vary the speed setting, turn the speed control knob (1).

If the wiper switch is set in AUTO mode when the ignition switch is ON, the wiper will operate once to perform a self-check of the system. Set the wiper to OFF position when the wiper is not in use.

### ! CAUTION

When the ignition switch is ON and the windshield wiper switch is placed in the AUTO mode, use caution in the following situations to avoid any injury to the hands or other parts of the body:

- Do not touch the upper end of the windshield glass facing the rain sensor.
- Do not wipe the upper end of the windshield glass with a damp or wet cloth.
- Do not put pressure on the windshield glass.

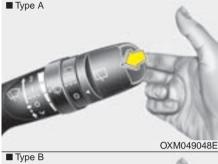
### ! CAUTION

When washing the vehicle, set the wiper switch in the OFF position to stop the auto wiper operation.

The wiper may operate and be damaged if the switch is set in the AUTO mode while washing the vehicle.

Do not remove the sensor cover located on the upper end of the passenger side windshield glass. Damage to system parts could occur and may not be covered by your vehicle warranty.

When starting the vehicle in winter, set the wiper switch in the OFF position. Otherwise, wipers may operate and ice may damage the windshield wiper blades. Always remove all snow and ice and defrost the windshield properly prior to operating the windshield wipers.





### Windshield washers

In the OFF position, pull the lever gently toward you to spray washer fluid on the windshield and to run the wipers 1-3 cycles.

Use this function when the windshield is dirty.

The spray and wiper operation will continue until you release the lever.

If the washer does not work, check the washer fluid level. If the fluid level is not sufficient, you will need to add appropriate non-abrasive windshield washer fluid to the washer reservoir.

The reservoir filler neck is located in the front of the engine compartment on the passenger side.

### ! CAUTION

To prevent possible damage to the washer pump, do not operate the washer when the fluid reservoir is empty.

### A WARNING

Do not use the washer in freezing temperatures without first warming the windshield with the defrosters; the washer solution could freeze on the windshield and obscure your vision.

#### ! CAUTION

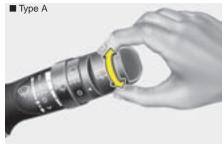
- To prevent possible damage to the wipers or windshield, do not operate the wipers when the windshield is dry.
- To prevent damage to the wiper blades, do not use gasoline, kerosene, paint thinner, or other solvents on or near them.
- To prevent damage to the wiper arms and other components, do not attempt to move the wipers manually.
- To prevent possible damage to the wipers and washer system, use anti-freezing washer fluids in the winter season or cold weather.

Headlight washer (if equipped)

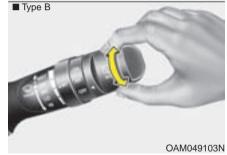
If your vehicle is equipped with the headlight washer it will operate at the same time when you operate the windshield washer. It will operate when the headlight switch is in the first or second position and the ignition switch or engine start/stop button is in the ON position. The washer fluid will be sprayed on to the headlights.

#### **\* NOTICE**

Check the headlight washers periodically to confirm that the washer fluid is being sprayed properly onto the head-light lenses.



OXM049103E



## Rear window wiper and washer switch (wagon)

The rear window wiper and washer switch is located at the end of the wiper and washer switch lever. Turn the switch to the desired position to operate the rear wiper and washer.

- └ / ON Normal wiper operation
- --- / INT Intermittent wiper operation (if equipped)
- O / OFF Wiper is not in operation



Type B



Push the lever away from you to spray rear washer fluid and to run the rear wipers 1~3 cycles. The spray and wiper operation will continue until you release the lever. (if equipped)

#### **INTERIOR LIGHT**

#### ! CAUTION

Do not use the interior lights for extended periods when the engine is not running.

It may cause battery discharge.

#### A WARNING

Do not use the interior lights when driving in the dark. Accidents could happen because the view may be obscured by interior lights.

#### Interior lamp AUTO cut

- When all entrances are closed, if you lock the vehicle by using the transmitter or the smart key, all interior lamp will be off within 5 seconds.
- If you do not operate anything in the vehicle after turning off the engine, the lights will turn off after 20 minutes.



#### Map lamp

Press the lens (1) to turn the map lamp on or off

- 🚟 : The map lamp and room lamp stays on at all times.
- ወ :
  - The map lamp and room lamp comes on when a door is opened. The lamps go out after approximately 30 seconds.
  - The map lamp and room lamp comes on for approximately 30 seconds when doors are unlocked with a transmitter or smart key as long as the doors are not opened.

- The map lamp and room lamp will stay on for approximately 20 minutes if a door is opened with the ignition switch in the ACC or LOCK/OFF position.
- The map lamp and room lamp will stay on continuously if the door is opened with the ignition switch in the ON position.
- The map lamp and room lamp will go out immediately if the ignition switch is changed to the ON position or all doors are locked.
- 🐨 : The lamps are off even if a door is opened.

#### \* NOTICE

When the lamp is turned on by pressing the lens (1), the lamp does not turn off even if the switch (2) is in the OFF position.



OHG040124

**Room lamp** Press the button to turn the light on or off.



OHG040128

#### Vanity mirror lamp

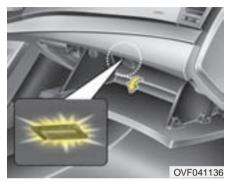
Opening the cover of the vanity mirror will automatically turn on the mirror lamp.



Sedan OVF041339

Luggage room lamp

The luggage room lamp comes on when the tailgate is opened.



Glove box lamp

The glove box lamp comes on when the glove box is opened.

#### WELCOME SYSTEM (IF EQUIPPED)

#### Escort welcome (if equipped)

When the headlight(light switch in the headlight or AUTO position) is on and all doors (and tailgate/trunk) are locked and closed, the headlight, position light and tail light will come on for 15 seconds if any of the below is performed.

- Without smart key system
- When the door unlock button is pressed on the transmitter.
- With the smart key system
- When the door unlock button is pressed on the smart key.

At this time, if you press the door lock button (on the transmitter or smart key), the lights will turn off immediately.

#### Interior light

When the interior light switch is in the DOOR position and all doors (and tailgate/trunk) are locked and closed, the room lamp and foot lamp (if equipped) will come on for 30 seconds if any of the below is performed.

- Without smart key system
- When the door unlock button is pressed on the transmitter.
- With the smart key system
- When the door unlock button is pressed on the smart key.
- When the button of the outside door handle is pressed.

At this time, if you press the door lock button, the lamps will turn off immediately.

#### DEFROSTER

#### ! CAUTION

To prevent damage to the conductors bonded to the inside surface of the rear window, never use sharp instruments or window cleaners containing abrasives to clean the window.

#### **\* NOTICE**

If you want to defrost and defog the front windshield, refer to "Windshield Defrosting and Defogging" in this section.





Rear window defroster

The defroster heats the window to remove frost, fog and thin ice from the interior and exterior of the rear window, while engine is running.

- To activate the rear window defroster, press the rear window defroster button located in the center facia switch panel. The indicator on the rear window defroster button illuminates when the defroster is ON.
- To turn off the defroster, press the rear window defroster button again.

#### **\* NOTICE**

- If there is heavy accumulation of snow on the rear window, brush it off before operating the rear defroster.
- The rear window defroster automatically turns off after approximately 20 minutes or when the ignition switch is turned off.

#### Outside mirror defroster (if equipped)

The outside mirror defroster will operate at the same time you turn on the rear window defroster.

#### MANUAL CLIMATE CONTROL SYSTEM (IF EQUIPPED)



- 1. Fan speed control switch
- 2. Air conditioning button
- 3. OFF button
- 4. Mode selection knob
- 5. MAX A/C selection button
- 6. Air intake control button
- 7. Temperature control switch

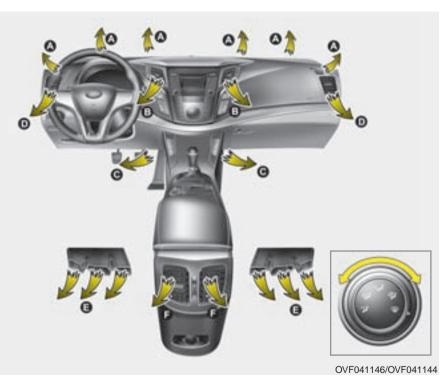
#### .! CAUTION

Operating the blower when the ignition switch is in the ON position could cause the battery to discharge. Operate the blower when the engine is running.

OVF041142

#### Heating and air conditioning

- 1. Start the engine.
- 2. Set the mode to the desired position. To improve the effectiveness of heating and cooling:
  - Heating: V
  - Cooling: 龙
- 3. Set the temperature control to the desired position.
- 4. Set the air intake control to the outside (fresh) air position.
- 5. Set the fan speed control to the desired speed.
- 6. If air conditioning is desired, turn the air conditioning system on.



Mode selection

The mode selection knob controls the direction of the airflow in the vehicle. Turn the knob to select the desired mode.



Face-Level (B, D, F)

Air flow is directed toward the upper body and face. Additionally, each outlet can be controlled to direct the air discharged from the outlet.



Bi-Level (B, D, C, E, F)

Air flow is directed towards the face and the floor.



Floor-Level (A, C, E, D)

Most of the air flow is directed to the floor, with a small amount of the air being directed to the windshield and side window defrosters.



Most of the air flow is directed to the floor and the windshield with a small amount directed to the side window defrosters.



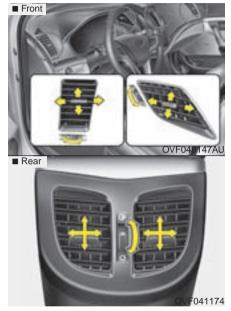
#### Defrost-Level (A, D)

Most of the air flow is directed to the windshield with a small amount of air directed to the side window defrosters.



MAX A/C-Level The MAX A/C mode is used to cool the inside of the vehicle faster.

In this mode, the air conditioning and the recirculated air position will be selected automatically.



#### Instrument panel vents

The outlet vents can be opened or closed separately using the thumbwheel.

Also, you can adjust the direction of air delivery from these vents using the vent control lever as shown.



0110111

Temperature control

The temperature control switch allows you to control the temperature of the air-flow in the vehicle.

To change the temperature:

- Press the ▲ (red) switch to increase temperature.
- Press the ▼ (blue) switch to decrease temperature.



OVF041148

Air intake control

The air intake control is used to select the outside (fresh) air position or recirculated air position.

To change the air intake control position, press the control button.

#### **Recirculated air position**



With the recirculated air position selected, air from the passenger compartment will be drawn through the heating system and heated or cooled according to the function selected.

#### Outside (fresh) air position



With the outside (fresh) air position selected, air enters the vehicle from outside and is heated or cooled according to the function selected.

#### **\* NOTICE**

Prolonged operation of the heater in the recirculated air position (without air conditioning selected) may cause fogging of the windshield and side windows and the air within the passenger compartment may become stale.

In addition, prolonged use of the air conditioning with the recirculated air position selected will result in excessively dry air in the passenger compartment.

#### A WARNING

- The continuous use of recirculated air in the climate control system may increase humidity inside the vehicle, causing the glass to fog and obscuring visibility.
- Do not sleep in a vehicle with the air conditioning or heating system on. It may cause serious harm or death due to a drop in the oxygen level and/or body temperature.
- The continuous use of recirculated air in the climate control system can produce drowsiness or sleepiness, which may result in a loss of vehicle control. Set the air intake control to the outside (fresh) air position as much as possible while driving.



#### Fan speed control

The ignition switch must be in the ON position for fan operation.

The fan speed control switch allows you to control the fan speed of the airflow in the vehicle.

To change the fan speed:

- Press the 😽 switch to increase fan speed.
- Press the **\*** switch to decrease fan speed.

To turn off the fan speed, press the OFF button.



*Air conditioning (if equipped)* Press the A/C button to turn the air conditioning system on (indicator light will

illuminate). Press the button again to turn the air conditioning system off.



#### OFF mode

Press the OFF button to turn off the air climate control system. However, you can still operate the air intake buttons as long as the ignition switch is in the ON position.

#### System operation

#### Ventilation

- 1. Set the mode to the 💙 position.
- 2. Set the air intake control to the outside (fresh) air position.
- 3. Set the temperature control to the desired position.
- 4. Set the fan speed control to the desired speed.

#### Heating

- 1. Set the mode to the 😼 position.
- 2. Set the air intake control to the outside (fresh) air position.
- 3. Set the temperature control to the desired position.
- 4. Set the fan speed control to the desired speed.
- 5. If dehumidified heating is desired, turn the air conditioning system on.
- If the windshield fogs up, set the mode to the information or information.

#### **Operation Tips**

- To keep dust or unpleasant fumes from entering the vehicle through the ventilation system, temporarily set the air intake control to the recirculated air position. Be sure to return the control to the fresh air position when the irritation has passed to keep fresh air in the vehicle. This will help keep the driver alert and comfortable.
- Air for the heating/cooling system is drawn in through the grilles just ahead of the windshield. Care should be taken that these are not blocked by leaves, snow, ice or other obstructions.
- To prevent interior fog on the windshield, set the air intake control to the fresh air position and fan speed to the desired position, turn on the air conditioning system, and adjust the temperature control to desired temperature.

#### Air conditioning (if equipped)

HYUNDAI Air Conditioning Systems are filled with environmentally friendly refrigerant\*.

- 1. Start the engine. Push the air conditioning button.
- 2. Set the mode to the 对 position.
- 3. Set the air intake control to the outside air or recirculated air position.
- 4. Adjust the fan speed control and temperature control to maintain maximum comfort.
- When maximum cooling is desired, set the temperature control to the lowest temperature, press the MAX A/C position selection button, then set the fan speed control to the highest speed.
- \*: Your vehicle is filled with R-134a or R-1234yf according to the regulation in your country at the time of producing. You can find out which air conditioning refrigerant is applied your vehicle at the label inside of the engine room. Refer to section 8 for more detail location of air conditioning refrigerant label.

#### ! CAUTION

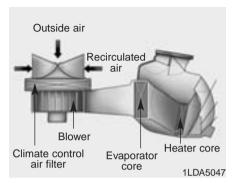
- The refrigerant system should only be serviced by trained and certified technicians to insure proper and safe operation.
- The refrigerant system should be serviced in a well-ventilated place.
- The air conditioning evaporator (cooling coil) shall never be repaired or replaced with one removed from a used or salvaged vehicle and new replacement MAC evaporators shall be certified (and labeled) as meeting SAE Standard J2842.

#### **\*** NOTICE

- When using the air conditioning system, monitor the temperature gauge closely while driving up hills or in heavy traffic when outside temperatures are high. Air conditioning system operation may cause engine overheating. Continue to use the blower fan but turn the air conditioning system off if the temperature gauge indicates engine overheating.
- When opening the windows in humid weather air conditioning may create water droplets inside the vehicle. Since excessive water droplets may cause damage to electrical equipment, air conditioning should only be used with the windows closed.

#### Air conditioning system operation tips

- If the vehicle has been parked in direct sunlight during hot weather, open the windows for a short time to let the hot air inside the vehicle escape.
- Use air conditioning to reduce humidity and moisture inside the vehicle on rainy or humid days.
- During air conditioning system operation, you may occasionally notice a slight change in engine speed as the air conditioning compressor cycles. This is a normal system operation characteristic.
- Use the air conditioning system every month only for a few minutes to ensure maximum system performance.
- When using the air conditioning system, you may notice clear water dripping (or even puddling) on the ground under the passenger side of the vehicle. This is a normal system operation characteristic.
- Operating the air conditioning system in the recirculated air position provides maximum cooling, however, continual operation in this mode may cause the air inside the vehicle to become stale.
- During cooling operation, you may occasionally notice a misty air flow because of rapid cooling and humid air intake. This is a normal system operation characteristic.



# Climate control air filter (if equipped)

The climate control air filter installed behind the glove box filters the dust or other pollutants that come into the vehicle from the outside through the heating and air conditioning system. If dust or other pollutants accumulate in the filter over a period of time, the air flow from the air vents may decrease, resulting in moisture accumulation on the inside of the windshield even when the outside (fresh) air position is selected. If this happens, we recommend that the climate control air filter be replaced by an authorized HYUNDAI dealer.

#### **\* NOTICE**

• Replace the filter according to the Maintenance Schedule.

If the car is being driven in severe conditions such as dusty, rough roads, more frequent climate control air filter inspections and changes are required.

• When the air flow rate suddenly decreases, we recommend that the system be checked by an authorized HYUNDAI dealer.





Type B



OVF066016

OVF066015

#### Air Conditioning refrigerant label

\* The actual Air Conditioning refrigerant label in the vehicle may differ from the illustration. Each symbols and specification on air conditioning refrigerant label means as below ;

- 1. Classification of refrigerant
- 2. Amount of refrigerant
- 3. Classification of Compressor lubricant

You can find out which air conditioning refrigerant is applied your vehicle at the label inside of the engine room.

Refer to section 8 for more detail location of air conditioning refrigerant label.

#### Checking the amount of air conditioner refrigerant and compressor lubricant

When the amount of refrigerant is low, the performance of the air conditioning is reduced. Overfilling also has a bad influence on the air conditioning system.

Therefore, if abnormal operation is found, we recommend that the system be inspected by an authorized HYUNDAI dealer.

#### A WARNING - Vehicles equipped with R-134a\*



Because the refrigerant is at very high pressure, the air conditioning system should only be serviced by trained and

certified technicians. It is important that the correct type and amount of oil and refrigerant is used. Otherwise, it may cause damage to

the vehicle and personal injury.

#### WARNING - Vehicles equipped with R-1234yf\*



Because the refrigerant is mildly inflammable and at very high pressure, the air conditioning system should only be serviced by trained and certified technicians. It is important that the correct type and amount of oil and refrigerant is used.

Otherwise, it may cause damage to the vehicle and personal injury.

\*: Your vehicle is filled with R-134a or R-1234yf according to the regulation in your country at the time of producing.

## AUTOMATIC CLIMATE CONTROL SYSTEM (IF EQUIPPED)

■ Type A (Vehicle equipped with audio system)



■ Type B (Vehicle equipped with AVN system)



- 1. Driver's temperature control button
- 2. Front windshield defroster button
- 3. Air conditioning button
- 4. Mode selection button
- 5. Fan speed control knob
- 6. AUTO (automatic control) button
- 7. OFF button
- 8. Dual temperature control selection button
- 9. Air intake control button
- 10. Climate control information screen selection button
- 11. Passenger's temperature control button
- 12. Climate control display

#### ! CAUTION

Operating the blower when the ignition switch is in the ON position could cause the battery to discharge. Operate the blower when the engine is running.

OVF041150/OVF041151

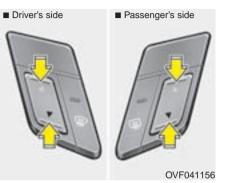


OVF0411

#### Automatic heating and air conditioning

1. Press the AUTO button.

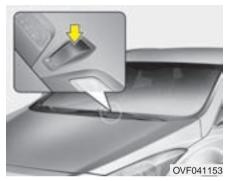
The modes, fan speeds, air intake and air-conditioning will be controlled automatically according to the temperature setting.



2. Set the temperature to the desired temperature.

#### **\* NOTICE**

- To turn the automatic operation off, select any button of the following:
  - Mode selection button
  - Front windshield defroster button (Press the button one more time to deselect the front windshield defroster function. The 'AUTO' sign will illuminate on the information display once again.)
  - Fan speed control knob
  - The selected function will be controlled manually while other functions operate automatically.
- For your convenience and to improve the effectiveness of the climate control, use the AUTO button and set the temperature to 22°C/71°F (23°C/73°F - Except Europe).



**\* NOTICE** 

Placing any object over the sensor on the instrument panel may interfere with the heating and cooling system.

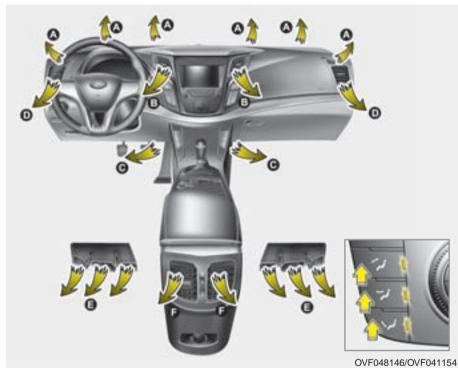
#### Manual heating and air conditioning

The heating and cooling system can be controlled manually by pressing buttons or turning knob(s) other than the AUTO button. In this case, the system works sequentially according to the order of buttons or knob(s) selected.

- 1. Start the engine.
- Set the mode to the desired position. To improve the effectiveness of heating and cooling:
  - Heating:
  - Cooling:
- 3. Set the temperature control to the desired position.

- 4. Set the air intake control to the outside (fresh) air position.
- 5. Set the fan speed control to the desired speed.
- 6. If air conditioning is desired, turn the air conditioning system on.

Press the AUTO button in order to convert to full automatic control of the system.



Mode selection

The mode selection button controls the direction of the airflow in the vehicle. If you push the button once, the corresponding switch will turn on, and if you push the button again, the switch will turn off. Face-Level (B, D, F)

Air flow is directed toward the upper body and face. Additionally, each outlet can be controlled to direct the air discharged from the outlet.

Most of the air flow is directed to the floor.

Defrost-Level (A, D)

Most of the air flow is directed to the windshield.

Also you may select  $2 \sim 3$  modes at the same time.

- face ( نر~ ) + floor ( نر~ ) mode
- face ( نر ) + defrost ( نر ) mode
- floor ( $\mathbf{i}_{\mathbf{i}}$ ) + defrost ( $\mathbf{i}_{\mathbf{i}}$ ) mode
- face ( سَرَ ) + floor ( سَرَ ) + defrost ( سَرَ ) mode

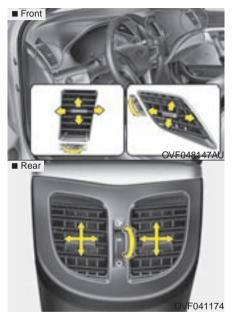




#### Maximum (MAX) defrost mode When you select the MAX defrost mode, the following system will set automatically:

- The air conditioning system will be turn on.
- The outside(fresh) air position will be selected.
- The fan speed will set to the high speed.

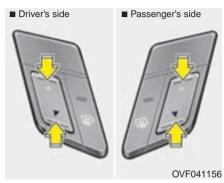
To turn the MAX defrost mode off, press the mode button or MAX defrost button again or AUTO button.



#### Instrument panel vents

The outlet vents can be opened or closed separately using the thumbwheel.

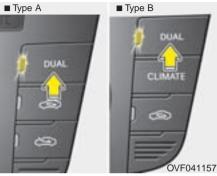
Also, you can adjust the direction of air delivery from these vents using the vent control lever as shown.



#### **Temperature control**

The temperature will increase to the maximum (HIGH) by holding the  $\blacktriangle$  button.

The temperature will decrease to the minimum (LOW) by holding the  $\checkmark$  button. The temperature will increase or decrease by 0.5°C/1°F. When set to the lowest temperature, the air conditioning will operate continuously.



# Adjusting the driver and passenger side temperature equally

- Press the DUAL button again to deactivate DUAL mode. The passenger side temperature will be set to the same temperature as the driver side.
- 2. Operate the driver side temperature control button. The driver and passenger side temperature will be adjusted equally.



OVF041158

#### Temperature conversion (Type A)

You can switch the temperature mode between Centigrade to Fahrenheit as follows:

While pressing the OFF button, press the AUTO button for 3 seconds or more.

The display will change from Centigrade to Fahrenheit, or from Fahrenheit to Centigrade.

#### **\* NOTICE**

- If the battery has been discharged or disconnected, the temperature mode display will reset to Centigrade.
- Vehicles equipped with AVN system refer to the navigation manual provided separately.

# Adjusting the driver and passenger side temperature individually

- 1. Press the DUAL button to operate the driver and passenger side temperature individually. Also, if the passenger side temperature control button is operated, it will automatically change to the DUAL mode as well.
- 2. Operate the driver side temperature control to adjust the driver side temperature. Operate the passenger side temperature control to adjust the passenger side temperature.

When the driver side temperature is set to the highest (HIGH) or lowest (LOW) temperature, the DUAL mode deactivates for maximum heating or cooling.





#### Outside (fresh) air position



Type B



#### **\* NOTICE**

Air intake control

This is used to select the outside (fresh) air position or recirculated air position. To change the air intake control position, push the control button.

#### **Recirculated air position**





With the recirculated air position selected, air from the passenger compartment will be drawn through the heating system and

Type B



heated or cooled according to the function selected.

With the outside (fresh) air position selected. air enters the vehicle from outside and is heated or cooled according to the

function selected

Prolonged operation of the heater in the recirculated air position (without air conditioning selected) may cause fogging of the windshield and side windows and the air within the passenger compartment may become stale.

In addition, prolonged use of the air conditioning with the recirculated air position selected will result in excessively dry air in the passenger compartment.

## A WARNING

- The continuous use of recirculated air in the climate control system may increase humidity inside the vehicle, causing the glass to fog and obscuring visibility.
- Do not sleep in a vehicle with the air conditioning or heating system on. It may cause serious harm or death due to a drop in the oxygen level and/or body temperature
- The continuous use of recirculat-• ed air in the climate control system can produce drowsiness or sleepiness, which may result in a loss of vehicle control. Set the air intake control to the outside (fresh) air position as much as possible while driving.



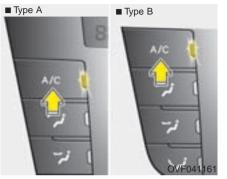
Fan speed control

The fan speed control knob allows you to control the fan speed of the airflow in the vehicle.

To change the fan speed:

- Turn the knob to the right (+) to increase fan speed.
- Turn the knob to the left (-) to decrease fan speed.

To turn off the fan speed, press the OFF button.



Air conditioning

Press the A/C button to turn the air conditioning system on (indicator light will illuminate).

Press the button again to turn the air conditioning system off.



#### OFF mode

Press the OFF button to turn off the air climate control system. However, you can still operate the air intake buttons as long as the ignition switch is in the ON position.



OVF041163

Climate information screen selection (for type B)

Press the climate information screen selection button to display climate information on the screen.

#### System operation

Ventilation

- 1. Set the mode to the 💙 position.
- 2. Set the air intake control to the outside (fresh) air position.
- 3. Set the temperature control to the desired position.
- 4. Set the fan speed control to the desired speed.

#### Heating

1. Set the mode to the 🗤 position.

- 2. Set the air intake control to the outside (fresh) air position.
- 3. Set the temperature control to the desired position.
- 4. Set the fan speed control to the desired speed.
- 5. If dehumidified heating is desired, turn the air conditioning system on.
- If the windshield fogs up, set the mode to the , i or , position.

#### **Operation Tips**

- To keep dust or unpleasant fumes from entering the vehicle through the ventilation system, temporarily set the air intake control to the recirculated air position. Be sure to return the control to the fresh air position when the irritation has passed to keep fresh air in the vehicle. This will help keep the driver alert and comfortable.
- Air for the heating/cooling system is drawn in through the grilles just ahead of the windshield. Care should be taken that these are not blocked by leaves, snow, ice or other obstructions.
- To prevent interior fog on the windshield, set the air intake control to the fresh air position and fan speed to the desired position, turn on the air conditioning system, and adjust the temperature control to desired temperature.

#### Air conditioning (if equipped)

HYUNDAI Air Conditioning Systems are filled with environmentally friendly refrigerant\*.

- 1. Start the engine. Push the air conditioning button.
- 2. Set the mode to the 💙 position.
- 3. Set the air intake control to the outside air or recirculated air position.
- Adjust the fan speed control and temperature control to maintain maximum comfort.
- \*: Your vehicle is filled with R-134a or R-1234yf according to the regulation in your country at the time of producing. You can find out which air conditioning refrigerant is applied your vehicle at the label inside of the engine room. Refer to section 8 for more detail location of air conditioning refrigerant label.

#### ! CAUTION

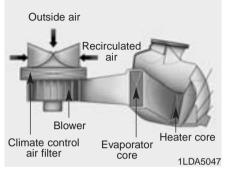
- The refrigerant system should only be serviced by trained and certified technicians to insure proper and safe operation.
- The refrigerant system should be serviced in a well-ventilated place.
- The air conditioning evaporator (cooling coil) shall never be repaired or replaced with one removed from a used or salvaged vehicle and new replacement MAC evaporators shall be certified (and labeled) as meeting SAE Standard J2842.

#### **\* NOTICE**

- When using the air conditioning system, monitor the temperature gauge closely while driving up hills or in heavy traffic when outside temperatures are high. Air conditioning system operation may cause engine overheating. Continue to use the blower fan but turn the air conditioning system off if the temperature gauge indicates engine overheating.
- When opening the windows in humid weather air conditioning may create water droplets inside the vehicle. Since excessive water droplets may cause damage to electrical equipment, air conditioning should only be used with the windows closed.

#### Air conditioning system operation tips

- If the vehicle has been parked in direct sunlight during hot weather, open the windows for a short time to let the hot air inside the vehicle escape.
- Use air conditioning to reduce humidity and moisture inside the vehicle on rainy or humid days.
- During air conditioning system operation, you may occasionally notice a slight change in engine speed as the air conditioning compressor cycles. This is a normal system operation characteristic.
- Use the air conditioning system every month only for a few minutes to ensure maximum system performance.
- When using the air conditioning system, you may notice clear water dripping (or even puddling) on the ground under the passenger side of the vehicle. This is a normal system operation characteristic.
- Operating the air conditioning system in the recirculated air position provides maximum cooling, however, continual operation in this mode may cause the air inside the vehicle to become stale.
- During cooling operation, you may occasionally notice a misty air flow because of rapid cooling and humid air intake. This is a normal system operation characteristic.



# Climate control air filter (if equipped)

The climate control air filter installed behind the glove box filters the dust or other pollutants that come into the vehicle from the outside through the heating and air conditioning system. If dust or other pollutants accumulate in the filter over a period of time, the air flow from the air vents may decrease, resulting in moisture accumulation on the inside of the windshield even when the outside (fresh) air position is selected. If this happens, we recommend that the climate control air filter be replaced by an authorized HYUNDAI dealer.

#### **\*** NOTICE

• Replace the filter according to the Maintenance Schedule.

If the car is being driven in severe conditions such as dusty, rough roads, more frequent climate control air filter inspections and changes are required.

• When the air flow rate suddenly decreases, we recommend that the system be checked by an authorized HYUNDAI dealer.

Example





OVF066015

Туре В



#### Air Conditioning refrigerant label

✤ The actual Air Conditioning refrigerant label in the vehicle may differ from the illustration. Each symbols and specification on air conditioning refrigerant label means as below :

- 1. Classification of refrigerant
- 2. Amount of refrigerant
- 3. Classification of Compressor lubricant

You can find out which air conditioning refrigerant is applied your vehicle at the label inside of the engine room.

Refer to section 8 for more detail location of air conditioning refrigerant label.

#### Checking the amount of air conditioner refrigerant and compressor lubricant

When the amount of refrigerant is low, the performance of the air conditioning is reduced. Overfilling also has a bad influence on the air conditioning system.

Therefore, if abnormal operation is found, we recommend that the system be inspected by an authorized HYUNDAI dealer.

#### WARNING - Vehicles equipped with R-134a\*



Because the refrigerant is at very high pressure, the air conditioning system should only be serviced by trained and

certified technicians. It is important that the correct type and amount of oil and refrigerant is used.

Otherwise, it may cause damage to the vehicle and personal injury.

#### WARNING - Vehicles equipped with R-1234yf\*



Because the refrigerant is mildly inflammable and at very high pressure, the air conditioning system should only be serviced by trained and certified technicians. It is important that the correct type and amount of oil and refrigerant is used.

Otherwise, it may cause damage to the vehicle and personal injury.

\*: Your vehicle is filled with R-134a or R-1234yf according to the regulation in your country at the time of producing.

#### WINDSHIELD DEFROSTING AND DEFOGGING

#### A WARNING - Windshield heating

Do not use the mathefree position during cooling operation in extremely humid weather. The difference between the temperature of the outside air and the windshield could cause the outer surface of the windshield to fog up, causing loss of visibility. In this case, set the mode selection to the *in* position and fan speed control to the lower speed.

- For maximum defrosting, set the temperature control to the hottest position and the fan speed control to the highest speed.
- If warm air to the floor is desired while defrosting or defogging, set the mode to the floor-defrost position.
- Before driving, clear all snow and ice from the windshield, rear window, outside rear view mirrors, and all side windows.
- Clear all snow and ice from the hood and air inlet in the cowl grill to improve heater and defroster efficiency and to reduce the probability of fogging up the inside of the windshield.



#### Manual climate control system

To defog inside windshield

- 1. Set the fan speed to the desired position.
- 2. Select desired temperature.
- 3. Select the 🗯 position.
- 4. The outside (fresh) air will be selected automatically. If the monotonic position is selected, air conditioning (if equipped) will also be selected automatically.

If the air conditioning and/or outside (fresh) air position are not selected automatically, press the corresponding button manually.



# Type A Type B OVE041166

#### To defrost outside windshield

- 1. Set the fan speed to the highest position.
- 2. Set the temperature to the hottest position.
- 3. Select the  $(\mathfrak{M})$  position.
- 4. The outside (fresh) air and air conditioning will be selected automatically.



To defog inside windshield

- 1. Set the fan speed to the desired position.
- 2. Select desired temperature.
- 3. Press the  $(\mathfrak{M})$  button.
- The air conditioning will turn on according to the detected ambient temperature and outside (fresh) air position will be selected automatically.

If the air conditioning is not selected automatically, adjust the corresponding button manually. If the  $\langle \mathfrak{M} \rangle$  position is selected, lower fan speed is adjusted to a higher fan speed.



To defrost outside windshield

- 1. Set the fan speed to the highest position.
- 2. Set the temperature to the hottest (HIGH) position.
- 3. Press the (m) button.
- The air conditioning will turn on according to the detected ambient temperature and outside (fresh) air position will be selected automatically.



Auto defogging system (Only for automatic climate control system, if equipped)

Auto defogging reduces the possibility of fogging up the inside of the windshield by automatically sensing the moisture of inside the windshield.

The auto defogging system operates when the AUTO mode is on.



This indicator illuminates when the auto defogging system senses the moisture of inside the windshield and operates.

If more moisture is in the vehicle, higher steps operate as follow.

- Step 1 : Operating the air conditioning
- Step 2 : Outside air position
- Step 3 : Blowing air flow toward the windshield
- Step 4 : Increasing air flow toward the windshield

If your vehicle is equipped with the auto defogging system, it is automatically activated when the conditions are met. However, if you would like to cancel the auto defogging system, press the front defroster button for 3 seconds.

The indicator will blink 3 times to notify you that the system is cancelled.

To use the auto defogging system again, press the front defroster button for 3 seconds again.

The indicator will blink 6 times to notify you that the system is activated.

If the battery has been disconnected or discharged, it resets to the auto defogging status.

#### **\* NOTICE**

If the A/C off is manually selected while the auto defogging system is on, the auto defogging indicator will blink 3 times to give notice that the A/C off can not be selected.

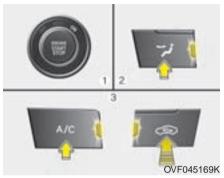
#### .! CAUTION

Do not remove the sensor cover located on the upper end of the driver side windshield glass. Damage to the system parts could occur and may not be covered by your vehicle warranty.

# Automatic ventilation (if equipped)

When the recirculated air intake position is selected for a certain period of time, the air intake position will be automatically changed to the outside (fresh) air position. To cancel or reset the automatic ventilation, do the following.





Manual climate control system

- 1. Press the engine start/stop button.
- 2. Select Face Level 龙 mode.
- 3. While holding the air conditioning (A/C) button pressed, press the air intake control button (recirculated air position) at least 5 times within 3 seconds.

If the battery has been discharged or disconnected, it resets to the automatic ventilation status. Automatic climate control system

- 1. Press the engine start/stop button.
- 2. Select Face Level 🏓 mode.
- 3. While holding the air conditioning (A/C) button pressed, press the air intake control button (recirculated air position) at least 5 times within 3 seconds.

If the battery has been discharged or disconnected, it resets to the automatic ventilation status.

#### Features of your vehicle

#### STORAGE COMPARTMENT

#### ! CAUTION

- To avoid possible theft, do not leave valuables in the storage compartment.
- Always keep the storage compartment covers closed while driving. Do not attempt to place so many items in the storage compartment that the storage compartment cover can not close securely.

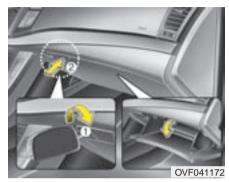
# WARNING - Flammable materials

Do not store cigarette lighters, propane cylinders, or other flammable/explosive materials in the vehicle. These items may catch fire and/or explode if the vehicle is exposed to hot temperatures for extended periods.



#### Center console storage

To open the center console storage, push the lever (1) and then lift up the cover.



#### Glove box

The glove box can be locked and unlocked with a key. (1)

To open the glove box, push the button (2) and the glove box will automatically open. Close the glove box after use.

#### A WARNING

To reduce the risk of injury in an accident or sudden stop, always keep the glove box door closed while driving.

#### .! CAUTION

Do not keep food in the glove box for a long time.



Do not put perishable food in the cool box because it may not maintain the necessary consistent temperature to keep the food fresh.



#### Sunglass holder

To open the sunglass holder, press the cover and the holder will slowly open. Place your sunglasses in the compartment door with the lenses facing out. Push to close.

#### Cool box (if equipped)

You can keep beverage cans or other items cool in the glove box.

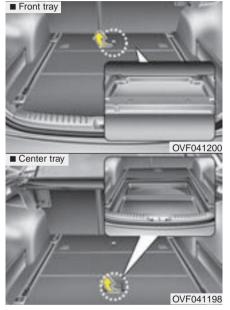
- 1. Turn on the air conditioning.
- 2. Slide the open/close lever (1) of the vent installed in the glove box to the open position.
- 3. When the cool box is not used, slide the lever (1) to the closed position.

#### **\* NOTICE**

If some items in the cool box block the vent, the cooling effectiveness of the cool box is reduced.

#### A WARNING

- Do not keep objects except sunglasses inside the sunglass holder. Such objects can be thrown from the holder in the event of a sudden stop or an accident, possibly injuring the passengers in the vehicle.
- Do not open the sunglasses holder while the vehicle is moving. The rear view mirror of the vehicle can be blocked by an open sunglass holder.
- Do not put the glasses forcibly into a sunglass holder to prevent breakage or deformation of glasses. It may cause personal injury if you try to open it forcibly when the glasses are jammed in holder.



Luggage tray (wagon)

You can place a first aid kit, a reflector triangle (front tray), tools, etc. in the box for easy access.

• Grasp the handle on the top of the cover and lift it.



#### Luggage side tray (wagon)

The luggage side tray can be used for storing small items.

• To open the cover, pull up the handle and lift the cover.



Luggage side partition (wagon)

#### **\* NOTICE**

The luggage side partitions can be removed to store long items in the luggage compartment.

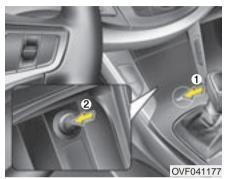


Rear seat floor pocket (wagon) (if equipped)

#### **A** WARNING

Do not put heavy or sharp objects in the pockets. In an accident they could come loose from the pocket and injure vehicle occupants.

## **INTERIOR FEATURES**



## **Cigarette lighter (if equipped)**

For the cigarette lighter to work, the ignition switch must be in the ACC position or the ON position.

To use the cigarette lighter:

- 1. Open the cover by pressing the switch.
- 2. Push the lighter all the way into the socket.

When the element has heated, the lighter will pop out to the "ready" position.

We recommend that you use parts for replacement from an authorized HYUNDAI dealer.

## A WARNING

- Holding the lighter in after it is heated will cause it to overheat.
- If the lighter does not pop out within 30 seconds, remove it to prevent overheating.
- Do not insert foreign objects into the socket of the cigarette lighter. It may damage the cigarette lighter.

## ! CAUTION

Only a genuine HYUNDAI lighter should be used in the cigarette lighter socket. The use of plug-in accessories (shavers, hand-held vacuums, and coffee pots, for example) may damage the socket or cause electrical failure.



### Ashtray (if equipped)

To use the ashtray, open the cover. To clean or empty the ashtray, pull it out.

## A WARNING - Ashtray use

- Do not use the vehicle's ashtray as a waste receptacle.
- Putting lit cigarettes or matches in an ashtray with other combustible materials may cause a fire.

### ! CAUTION

When cleaning spilled liquid, do not dry the cup holder at high temperatures. This may damage the chrome part of the cup holder.

#### Cup holder

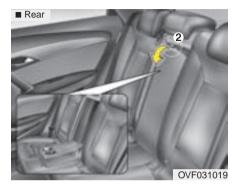
Cups or small beverage cans may be placed in the cup holders.

## A WARNING - Hot liquids

- Do not place uncovered cups of hot liquid in the cup holder while the vehicle is in motion. If the hot liquid spills, you may burn yourself. Such a burn to the driver could lead to loss of control of the vehicle.
- To reduce the risk of personal injury in the event of sudden stop or collision, do not place uncovered or unsecured bottles, glasses, cans, etc., in the cup holder while the vehicle is in motion.

# Front 1 OVE041178

**Front** To use the cup holder, open the cover. (1)



**Rear** To use the cup holder, pull down the armrest. (2)

## A WARNING

Keep cans and bottles out of direct sunlight. Placing them in a hot vehicle can cause them to explode.



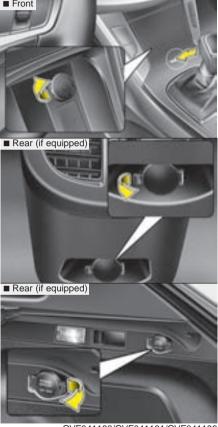
#### Sunvisor

Use the sunvisor to shield direct light through the front or side windows.

To use the sunvisor, pull it downward. To use the sunvisor for the side window, pull it downward, unsnap it from the bracket (1) and swing it to the side (2). To use the vanity mirror, pull down the visor and slide the mirror cover (3). The vanity mirror light comes on. The ticket holder (4) is provided for holding a tollgate ticket.

## A WARNING

For your safety, do not block your view when using the sunvisor.



#### OVF041180/OVF041181/OVF041186

#### **Power outlet**

The power outlet is designed to provide power for mobile telephones or other devices designed to operate with vehicle electrical systems. The devices should draw less than 10 amps with the engine running.

## .! CAUTION

- Use power outlet only when the engine is running and remove the accessory plug after use. Using the accessory plug for prolonged periods of time with the engine off could cause the battery to discharge.
- Only use 12V electric accessories which are less than 10A in electric capacity.
- Adjust the air-conditioner or heater to the lowest operating level when using the power outlet.
- Close the cover when not in use.
- Some electronic devices can cause electronic interference when plugged into a vehicle's power outlet. These devices may cause excessive audio static and malfunctions in other electronic systems or devices used in your vehicle.

## A WARNING

Do not put a finger or a foreign element (pin, etc.) into a power outlet and do not touch with a wet hand. You may get electrocuted or fire may occur.



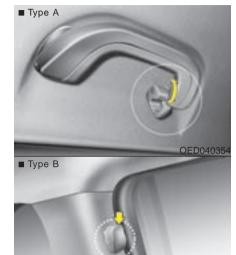
## Aux, USB and iPod (if equipped)

If your vehicle has an aux and/or USB(universal serial bus) port, you can use an aux port to connect audio devices and an USB port to plug in an USB and an iPod.

## **\* NOTICE**

When using a portable audio device connected to the power outlet, noise may occur during playback. If this happens, use the power source of the portable audio device.

ℜ iPod<sup>®</sup> is a trademark of Apple Inc.



## 

• Do not hang heavy clothes, since those may damage the hook.

Clothes hanger (if equipped)

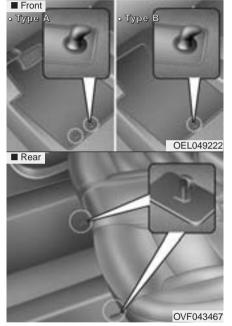
• Be careful when opening and closing the doors. Clothes, etc. may get caught between the door gap.

OVF041201

## A WARNING



Do not hang other objects such as hangers or hard objects except clothes. Also, do not put heavy, sharp or breakable objects in the clothes pockets. In an accident or when the curtain air bag is inflated, it may cause vehicle damage or personal injury.



Floor mat anchor(s) (if equipped)

When using a floor mat on the front floor carpet, make sure it attaches to the floor mat anchor(s) in your vehicle. This keeps the floor mat from sliding forward.

## A WARNING

The following must be observed when installing ANY floor mat to the vehicle.

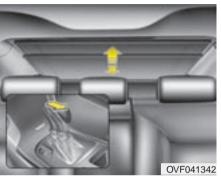
- Ensure that the floor mats are securely attached to the vehicle's floor mat anchor(s) before driving the vehicle.
- Do not use ANY floor mat that cannot be firmly attached to the vehicle's floor mat anchors.
- Do not stack floor mats on top of one another (e.g. all-weather rubber mat on top of a carpeted floor mat). Only a single floor mat should be installed in each position.

IMPORTANT – Your vehicle was manufactured with driver's side floor mat anchors that are designed to securely hold the floor mat in place. To avoid any interference with pedal operation, we recommend that the HYUNDAI floor mat designed for use in your vehicle be installed.



Rear curtain (sedan) (if equipped)

To fold the rear curtain, press the button. To unfold the rear curtain, press the button again.

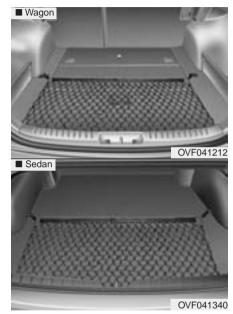


The rear curtain will fold automatically when you shift the shift lever into R (Reverse) and unfold automatically when you shift the shift lever from R (Reverse) into P (Park).

After the rear curtain is folded by shifting the shift lever into R (Reverse) and drive more than 20 km/h with the shift lever in D (Drive), the rear curtain will unfold automatically.

## ! CAUTION

Do not pull or fold the rear curtain by hand. It could cause motor failure.



#### Luggage net (holder) (if equipped)

To keep items from shifting in the cargo area, you can use the four holders located in the cargo area to attach the luggage net.

If necessary, we recommend that you contact your authorized HYUNDAI dealer to obtain a luggage net.

### **\* NOTICE**

Vehicles equipped with a luggage rail system may use the shackles to hook the luggage net.

## ! CAUTION

To prevent damage to the goods or the vehicle, care should be taken when carrying fragile or bulky objects in the luggage compartment.

## A WARNING

To avoid eye injury, DO NOT overstretch the luggage net. ALWAYS keep your face and body out of the luggage net's recoil path. DO NOT use the luggage net when the strap has visible signs of wear or damage.



#### Barrier net (wagon) (if equipped)

When you load cargo on the rear seat or rear cargo area, you must install the barrier net behind the front seatback or rear seatback.

It is designed to help protect the heads of the occupants by preventing objects from flying forward in frontal collisions.

There are four hook holders on both side of the headliner over the headrests for upper side fixation and on the floor behind the rear seats for lower side fixation.



To use the barrier net

- 1. Pull up the net by the handle in the center(1).
- 2. Open the cover(2).
- 3. Compress the one side net upper shaft to lengh direction before insert the hook into the large hole(3) until it reaches the very top.
- 4. Then secure it by sliding it into the small hole(4).
- 5. Hold the hooked side and then with the other hand, hook the other side of the net.

## ! CAUTION

Be careful not the scratch the side panel when inserting the hook into the hole.

## A WARNING

- Do not put passengers in the rear seat or cargo area behind the barrier net.
- Do not put passenger in the rear center seat when the barrier net is installed behind the rear seats. The barrier net may interfere with use of the rear center safety belt.
- Do not load cargo in the area higher than the barrier net's upper end.
- Do not load heavy cargo in the area higher than the seatback to avoid accident even if the barrier net is installed.
- Do not load cargo which has sharp edge that can pass through the barrier net.
- Do not apply excessive force to the barrier net by hanging on to the net or by suspending heavy cargo and so on.

#### When the barrier net is not in use :

- 1. Remove the hook by pulling it through the large holes.
- 2. Slide the net down.



To remove the barrier net

- 1. Press the lock release button(1) located at the end of both sides.
- 2. While pressing the button(1), pull out the barrier net(2).

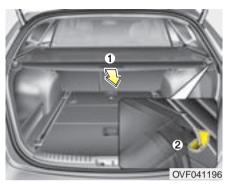
## **\* NOTICE**

The cargo security screen must be removed first to remove the barrier net.



## Cargo security screen (wagon) (if equipped)

Use the cargo security screen to hide items stored in the cargo area.



To use the cargo security screen

- 1. Pull the cargo security screen towards the rear of the vehicle by the handle (1).
- 2. Insert the guide pin into the guide (2).

#### **\* NOTICE**

Pull out the cargo security screen with the handle in the center to prevent the guide pin from falling out of the guide.

## When the cargo security screen is not in use:

- 1. Push down the center of the cargo security screen (approximately 70 degree).
- 2. The cargo security screen will automatically slide back in.

## **\*** NOTICE

The cargo security screen may not automatically slide back in if the cargo security screen is not fully pulled out. Fully pull it out and then let go.



To remove the cargo security screen

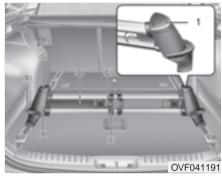
- 1. Push in the guide pin(1).
- 2. Push the lever (2) towards the rear of the vehicle.
- 3. While pushing the lever, pull out the cargo security screen (3).

## A WARNING

- Do not place objects on the cargo security screen. Such objects may be thrown about inside the vehicle and possibly injure vehicle occupants during an accident or when braking.
- Never allow anyone to ride in the luggage compartment. It is designed for luggage only.
- Maintain the balance of the vehicle and locate the weight as forward as possible.

## ! CAUTION

Since the cargo security screen may be damaged or malformed, do not put luggage on it when it is used.



## Luggage rail system (wagon)

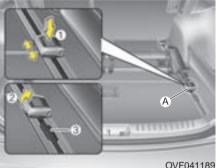
The luggage rail system may prevent the luggage from sliding around in the luggage compartment.

#### Build in segmentation bar

- Put both pillars (A) from the segmentation bar in the openings from the rail.
- To move the segmentation bar, put vour hand on the side of the pillar and push down the lever arm (B).
- · Make sure the pillars click into place.
- To release the belt, turn the upper element (C) to the left or right until it clicks.
- Now you can pull the belt (D) and secure your luggage by putting the belt around the luggage and put the hook (E) into the middle of the segmentation bar (F).
- For bulky luggage, you can hook both hooks into each other.
- · To make sure the belt locks, put the upper element (C) back into the lock position (1).

## ! CAUTION

- The segmentation bar must be mounted and demounted with both pillars simultaneously.
- Max. load: 30 kg with one belt 40 kg with two belts



Applying the shackle on the guide rail

- Put the shackle (A) in the position where the shackle is put in the rail.
- To move the shackle, press the button (1) and move the shackle along the rail.
- Make sure the shackle is clicked into place.
- To fix the luggage, pull up the hook (2) in the middle cargo bay.
- · Now you can mount e.g. belt to fix the luggage in the hook.
- The shackle cannot be used in the position where the shackle is put in and out of the rail (3).

. CAUTION Tensile force : max. 30 kgf. for 1 shackle

## **EXTERIOR FEATURES (WAGON)**



#### Mounting bracket for roof carrier

To install or remove a roof carrier, you can use the mounting bracket and cover on the roof.

When you install a roof carrier, use the following procedure.

1. Insert a slim tool(flat blade driver) into the slot and pry open the cover.



OV/F041208

2. After using the roof carrier, install the cover back on the roof in the reverse order

## A WARNING

Use a coin or flat blade driver when you remove the roof carrier cover. If you use your fingernail, it may damage your fingernail.

#### **\* NOTICE**

If the vehicle is equipped with a sunroof, be sure not to position cargo onto the roof in such a way that it could interfere with sunroof operation.

## . CAUTION

- When carrving cargo on the roof. take the necessary precautions to make sure the cargo does not damage the roof of the vehicle.
- · When carrying large objects on the roof, make sure they do not exceed the overall roof length or width.

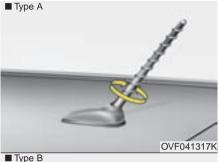
## A WARNING

- The vehicle center of gravity will be higher when items are loaded onto the roof. Avoid sudden starts, braking, sharp turns, abrupt maneuvers or high speeds that may result in loss of vehicle control or rollover resulting in an accident.
- · Always drive slowly and turn corners carefully when carrying items on the roof. Severe wind updrafts, caused by passing vehicles or natural causes, can cause sudden upward pressure on items loaded on the roof. This is especially true when carrying large, flat items such as wood panels or mattresses. This could cause the items to fall off the roof and cause damage to your vehicle or others around you.
- To prevent damage or loss of cargo while driving, check frequently before or while driving to make sure the items on the roof are securely fastened.

## **AUDIO SYSTEM**

### **\* NOTICE**

- If you install an aftermarket HID head lamp, your vehicle's audio and electronic device may malfunction.
- Prevent chemicals such as perfume, cosmetic oil, sun cream, hand cleaner. and air freshener from contacting the interior parts because they may cause damage or discoloration.







Antenna (if equipped)

Roof antenna (Type A)

Your car uses a roof antenna to receive both AM and FM broadcast signals. This antenna is a removable type. To remove the antenna, turn it counterclockwise. To install the antenna, turn it clockwise.

#### Shark fin antenna (Type B)

The shark fin antenna will receive the transmit data

## . CAUTION

- · Before entering a place with a low height clearance or a car wash, remove the antenna by rotating it counterclockwise. If not, the antenna may be damaged.
- · When reinstalling your antenna, it is important that it is fully tightened and adjusted to the upright position to ensure proper reception. But it could be removed when parking the vehicle or when loading cargo on the roof rack.
- When cargo is loaded on the roof rack, do not place the cargo near the antenna pole to ensure proper reception.



#### Glass antenna (if equipped)

When the radio power switch is turned on while the ignition switch is in either the "ON" or "ACC" position, your car will receive both AM and FM broadcast signals through the antenna in the rear window glass.

## ! CAUTION

- Do not clean the inside of the rear window glass with a cleaner or use a scraper to remove foreign deposits as this may cause damage to the antenna elements.
- Avoid adding metallic coating (such as Ni, Cd, and so on). These can disturb receiving broadcast signals.
- To prevent damage to the rear glass antenna, never use sharp instruments or window cleaner containing abrasives to clean the window. Clean the inside surface of the rear glass window with a piece of soft cloth.
- When putting a sticker on the inside surface of the rear window, be careful not to damage to the rear glass antenna.
- Do not put sharp instruments nearby the rear glass antenna.
- Tinted rear window may affect the proper functioning of the antenna.



## Audio remote control (if equipped)

The steering wheel audio remote control button is installed to promote safe driving.

## ! CAUTION

Do not operate the audio remote control buttons simultaneously.

#### MODE (1)

Press the button to select Radio.

#### VOL (+ / -) (2)

- Push up the lever to increase volume.
- Push down the lever to decrease volume.

## SEEK ( $^{\wedge}$ / $^{\vee}$ ) (3)

The SEEK/PRESET button has different functions base on the system mode. For the following functions the button should be pressed for 0.8 seconds or more.

#### **RADIO** mode

It will function as the AUTO SEEK select button.

If the SEEK button is pressed for less than 0.8 second, it will work as follows in each mode.

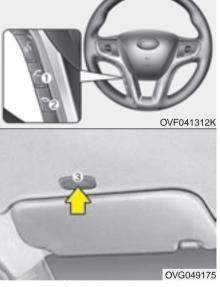
#### **RADIO** mode

It will function as the PRESET STATION select buttons.

Detailed information for audio control buttons are described in the following pages in this section.

## Audio / Video / Navigation system (AVN)

Detailed information for the AVN system is described in a separately supplied manual.



## *Bluetooth®* Wireless Technology hands-free

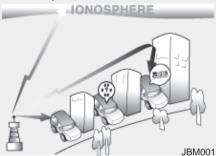
You can use the phone wirelessly by using the *Bluetooth®* Wireless Technology.

- (1) Call / Answer button
- (2) Call end button
- (3) Microphone

Detailed information for the *Bluetooth®* Wireless Technology hands-free is described in the manual supplied separately.

#### How vehicle audio works

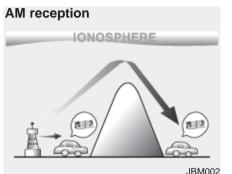




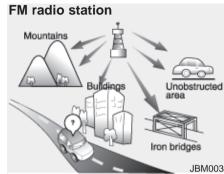
AM and FM radio signals are broadcast from transmitter towers located around your city. They are intercepted by the radio antenna on your vehicle. This signal is then received by the radio and sent to your vehicle speakers.

When a strong radio signal has reached your vehicle, the precise engineering of your audio system ensures the best possible quality reproduction. However, in some cases the signal coming to your vehicle may not be strong and clear.

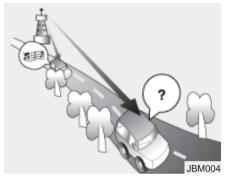
This can be due to factors, such as the distance from the radio station, closeness of other strong radio stations or the presence of buildings, bridges or other large obstructions in the area.



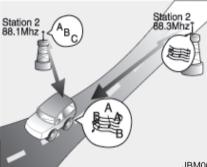
AM broadcasts can be received at greater distances than FM broadcasts. This is because AM radio waves are transmitted at low frequencies. These long, low frequency radio waves can follow the curvature of the earth rather than travelling straight out into the atmosphere. In addition, they curve around obstructions so that they can provide better signal coverage.



FM broadcasts are transmitted at high frequencies and do not bend to follow the earth's surface. Because of this, FM broadcasts generally begin to fade at short distances from the station. Also, FM signals are easily affected by buildings, mountains, or other obstructions. These can result in certain listening conditions which might lead you to believe a problem exists with your radio. The following conditions are normal and do not indicate radio trouble:



- Fading As your vehicle moves away from the radio station, the signal will weaken and sound will begin to fade. When this occurs, we suggest that you select another stronger station.
- Flutter/Static Weak FM signals or large obstructions between the transmitter and your radio can disturb the signal causing static or fluttering noises to occur. Reducing the treble level may lessen this effect until the disturbance clears.



JBM005

- Station Swapping As a FM signal weakens, another more powerful signal near the same frequency may begin to play. This is because your radio is designed to lock onto the clearest signal. If this occurs, select another station with a stronger signal.
- Multi-Path Cancellation Radio signals being received from several directions can cause distortion or fluttering. This can be caused by a direct and reflected signal from the same station, or by signals from two stations with close frequencies. If this occurs, select another station until the condition has passed.

## Using a cellular phone or a two-way radio

When a cellular phone is used inside the vehicle, noise may be produced from the audio system. This does not mean that something is wrong with the audio equipment. In such a case, use the cellular phone at a place as far as possible from the audio equipment.

## ! CAUTION

When using a communication system such as a cellular phone or a radio set inside the vehicle, a separate external antenna must be fitted. When a cellular phone or a radio set is used with an internal antenna alone, it may interfere with the vehicle's electrical system and adversely affect safe operation of the vehicle.

## 

Do not use a cellular phone while driving. Stop at a safe location to use a cellular phone. iPod®

iPod<sup>®</sup> is a registered trademark of Apple Inc.

#### Bluetooth<sup>®</sup> Wireless Technology

The Bluetooth<sup>®</sup> word mark and logos are registered trademarks owned by Bluetooth SIG, Inc. and any use of such marks by HYUNDAI is under license. Other trademarks and trade names are those of their respective owners.

A *Bluetooth®* Wireless Technology enabled cell phone is required to use *Bluetooth®* Wireless Technology.

## 🚯 Bluetooth

## AUDIO (With Touch Screen)

■ Type B-1



■ Type B-2



(With Bluetooth® Wireless Technology)

3ZH4J0000EE/3ZH4J0001EE

## Feature of Your Audio

#### Head unit

Type B-1



#### Type B-2



✤ The actual features in the vehicle may differ from the illustration.

#### (1) **RADIO**

• Start FM and AM Radio.

#### (2) MEDIA

- Select USB(iPod®), Bluetooth® (BT) Audio or AUX.
- Display the media menu when two or more media are connected or when the **[MEDIA]** button is pressed in media mode.

#### (3) PHONE

• Start Bluetooth® Phone mode.

#### (4) POWER/VOLUME knob

- Turn to adjust the volume.
- Press to turn the device on or off.

### (5) SEEK/TRACK

- Search for next station in radio mode.
- Change the current song in media mode.

## Features of your vehicle

#### Type B-1



Type B-2



#### (6) **DISP**

• Turn the display on or off.

#### (7) CLOCK

• Move to the Time setting screen.

#### (8) SETUP

 Access Display, Sound, Date/Time, Bluetooth, System, Screensaver and Display Off settings.

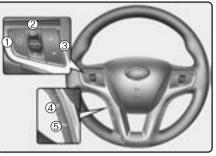
#### (9) TUNE knob

- Turn to navigate through the stations/songs list.
- Press to select an item.

#### (10) **RESET**

• Shutdown and restart the system.

#### Steering wheel remote control



\* The actual features in the may differ from the illustration.

#### (1) **MODE**

- Press the button to change the mode in the following order: Radio → Media.
- Press and hold the button to turn off. (if equipped)

#### (2) VOLUME

· Press to adjust the volume.

#### (3) **UP/DOWN**

- Press the button in radio mode to search Presets.
- Press and hold the button in radio mode to search frequencies.
- Press the button in media mode to change the current song. (except AUX)
- Press and hold the button in media mode to quick search through songs. (except Bluetooth<sup>®</sup>(BT) Audio and AUX)

#### (4) CALL

- · Pressing the button
  - If not in Bluetooth<sup>®</sup> Handsfree mode or receiving a phone call.

First press: Display Dial Number screen.

Second press: Automatically display the most recently Dialed Call number.

Third press: Dial the phone number entered.

- Press in the Incoming Call notification screen to accept the phone call.
- Press in Bluetooth<sup>®</sup> Handsfree mode to switch to the waiting call.

- Pressing and holding the button (more than 1.0 seconds)
  - If not in Bluetooth<sup>®</sup> Handsfree mode or receiving a phone call, the most recently Dialled call number is dialed.
  - Press in Bluetooth<sup>®</sup> Handsfree mode to transfer the call to your cell phone.
  - Press in cell phone mode to switch to Bluetooth<sup>®</sup> Handsfree mode.

#### (5) **END**

- Press in Bluetooth<sup>®</sup> Handsfree mode to end the phone call.
- Press in the incoming call screen to reject the call.

## A WARNING

- Do not stare at the screen while driving. Staring at the screen for prolonged periods of time could lead to traffic accidents.
- Do not disassemble, assemble, or modify the audio system. Such acts could result in accidents, fire, or electric shock.
- Using the phone while driving may lead to a lack of attention of traffic conditions and increase the likelihood of accidents. Use the phone feature after parking the vehicle.
- Exercise caution not to spill water or introduce foreign objects into the device. Such acts could lead to smoke, fire, or product malfunction.

(Continued)

#### (Continued)

- Please refrain from use if the screen is blank or no sound can be heard as these signs may indicate product malfunction. Continued use in such conditions could lead to accidents (fires, electric shock) or product malfunctions.
- Do not touch the antenna during thunder or lightning because such an act may cause electric shock.
- Do not stop or park in parkingrestricted areas to operate the product. Such acts could lead to traffic accidents.
- Use the system with the vehicle engine turned on. Prolonged use with the ignition turned on only could result in battery discharge.

## **A** WARNING

Driving while distracted can result in a loss of vehicle control that may lead to an accident, severe personal injury, and death. The driver's primary responsibility is in the safe and legal operation of a vehicle, and use of any handheld devices, other equipment, or vehicle systems which take the driver's eyes, attention and focus away from the safe operation of a vehicle or which are not permissible by law should never be used during operation of the vehicle.

## **! CAUTION**

- Operating the device while driving could lead to accidents due to a lack of attention to external surroundings. First park the vehicle before operating the device.
- Adjust the volume to levels that allow the driver to hear sounds from outside of the vehicle. Driving in a state where external sounds cannot be heard may lead to accidents.
- Pay attention to the volume setting when turning the device on. A sudden output of extreme volume upon turning the device on could lead to hearing impairment. (Adjust the volume to a suitable level before turning off the device.) (Continued)

#### (Continued)

- Turn on the car engine before using this device. Do not operate the audio system for long periods of time only with the ignition turned on as such operations may lead to battery discharge.
- Do not subject the device to severe shock or impact. Direct pressure onto the front side of the monitor may cause damage to the LCD.
- When cleaning the device, make sure to turn off the device and use a dry and smooth cloth. Never use tough materials, chemical cloths, or solvents (alcohol, benzene, thinners, etc.). As such materials may damage the device panel or cause color/quality deterioration. (Continued)

#### (Continued)

- Do not place beverages close to the audio system. Spilling beverages may lead to system malfunction.
- In case of product malfunction, please contact your place of purchase or After Service center.
- Placing the audio system within an electromagnetic environment may result in noise interference.
- Prevent caustic solutions such as perfume and cosmetic oil from contacting the dashboard because they may cause damage or discoloration.

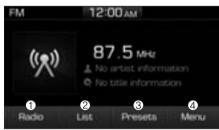
#### Information on status icons

Icons showing audio status are shown in the upper-right corner of the screen.

	lcon	Description
%	Mute	Mute engaged
	Battery	Remaining battery life of a connected Bluetooth® device
¢	Handsfree + Audio stream- ing connection	Bluetooth <sup>®</sup> Handsfree call and audio stream- ing available
Ē	Handsfree connection	Bluetooth <sup>®</sup> Handsfree call available
8,	Bluetooth <sup>®</sup> audio streaming	Bluetooth <sup>®</sup> audio streaming available
G	Downloading contacts	Downloading contacts through Bluetooth <sup>®</sup> wire- less communications
G	Downloading call history	Downloading call history through Bluetooth <sup>®</sup> wire- less communications
G	Line busy	Phone call in progress
• 2:	Mute mic	Mic muted during a call (caller cannot hear your voice)
8%)	Phone signal strength	Display the phone signal strength for a cell phone connected by Bluetooth®

#### Radio

#### FM/AM (with RDS)



(1) Radio Switch between FM and AM.

(2) List View all available stations.

(3) PresetsView all presets.

(4) Menu Navigate to the menu screen.

#### Switching between FM and AM

- Press the [RADIO] button on the audio system to switch between FM and AM.
- Select [Radio] on the screen to switch between FM and AM.

#### Searching stations

Press the **[SEEK/TRACK]** button to search stations.

#### List

A list of all available stations in the vehicle's current location is displayed. Select the desired station.

Favourite stations can be saved to [Presets] by selecting [+].

#### Presets

Save up to 40 frequently used stations.

To listen to a preset, select the desired station list.

Press and hold the desired slot from 1 through 40. This saves the current station in the selected slot.

If the slot is empty, simply selecting saves the station to the slot.

#### Menu

- Traffic Announcement (TA): Enable or disable Traffic Announcements.
- Scan: All available stations are played for five seconds each.
- Sound Settings: Audio sound settings can be changed.

#### DAB/FM (with DAB)



#### (1) Radio Switch between DAB/FM and AM.

### (2) List

View all available stations.

## (3) PresetsView all presets.

(4) Menu Navigate to the menu screen.

#### Switching between DAB/FM and AM

- Press the [RADIO] button on the audio system to switch between DAB/FM and AM.
- Select [Radio] on the screen to switch between DAB/FM and AM.

#### Searching stations

Press the **[SEEK/TRACK]** button to search stations.

#### List

A list of all available stations in the vehicle's current location is displayed. Select the desired station.

Favourite stations can be saved to [Presets] by selecting [+].

#### Presets

Save up to 40 frequently used stations.

To listen to a preset, select the desired station list.

Press and hold the desired slot from 1 through 40. This saves the current station in the selected slot.

If the slot is empty, simply selecting saves the station to the slot.

#### Menu

- Traffic Announcement (TA): Enable or disable Traffic Announcements.
- Region: Enable or disable automatic switching between regional stations.
- Scan: All available stations are played for five seconds each.
- Sound Settings: Audio sound settings can be changed.
- Manual tune FM: Search for frequencies manually.

#### FM/AM (without RDS)



(1) Radio Switch between FM and AM.

(2) PresetsView all presets.

(3) List View all available stations.

(4) Menu Navigate to the menu screen.

#### Switching between FM and AM

- Press the [RADIO] button on the audio system to switch between FM and AM.
- Select [Radio] on the screen to switch between FM and AM.

#### Searching stations

Press the **[SEEK/TRACK]** button to search stations.

#### List

A list of all available stations in the vehicle's current location is displayed. Select the desired station.

Favourite stations can be saved to [Presets] by selecting [save].

#### Presets

Save up to 40 frequently used stations.

To listen to a preset, select the desired station list.

Press and hold the desired slot from 1 through 40. This saves the current station in the selected slot.

If the slot is empty, simply selecting saves the station to the slot.

#### Menu

- Scan: All available stations are played for five seconds each.
- Sound Settings: Audio sound settings can be changed.

#### Media

#### **\* NOTICE - Using MP3** Supported audio formats

Audio formats	WAVeform audio format
	MPEG1 Audio Layer3
	MPEG2 Audio Layer3
audio formats	MPEG2.5 Audio Layer3
	Windows Media Audio Ver 7.X & 8.X

## **!** CAUTION

File formats other than the formats above may not be recognized or playable. Information such as filename may not be displayed.

#### **Range of supported file types** 1. Bit rate range (Kbps)

	MPEG1	MF	PEG2	MPEG2	2.5	WMA
	Layer3				High Range	
	32	8		8		48
HAI E(kbps)	40		16	16		64
	48	24		24		80
	56	32		32		96
	64		40	40		128
	80		48	48		160
	96		56	56		192
Δ	112		64	64		
	128		80	80		
n	160		96	96		
	192	1	12	112		
	224	128		128		
	256	144		144		
	320	160		160		
	WAV					
	PCM(Stereo)		IMA ADPCM		MS ADPCM	
	24		4		4	

#### 2. Sampling frequency (Hz)

MPEG1	MPEG2	MPEG2.5	WMA	WAV
44100	22050	11025	32000	44100
48000	24000	12000	44100	48000
32000	16000	8000	48000	

- The sound quality of MP3/WMA compressed and WAV files may vary depending on the bitrate. (A higher bitrate can have better sound quality.)
- The product only recognizes files with the MP3, WMA or WAV extension. Files without one of these extensions are not recognized.
- 3. Number of recognizable folders and files
- Folders: 2,000 for USB
- Files: 6,000 for USB
- No recognition limit for folder hierarchies.

- 4. Character display range (Unicode)
- Filenames: Up to 64 English characters (64 Korean characters)
- Foldernames: Up to 32 English characters (32 Korean characters)

## ! CAUTION

The scroll feature can be used to display file and folder names that are too long to display on the screen. (if equipped)

#### Languages supported (Unicode support)

- Korean: 2,604 characters
- English: 94 characters
- Common Chinese characters: 4,888
   characters
- Special symbols: 986 characters

! CAUTION

Japanese/Simplified Chinese characters are not supported.

#### \* NOTICE - Using the USB Devices

- Starting the vehicle while a USB device is connected can damage the device. Please disconnect USB devices before starting the vehicle.
- Starting the vehicle or stopping the engine while an external USB device is connected can result in failure of the external USB device to operate.
- Be cautious of static electricity when connecting/disconnecting external USB devices.
- An encrypted MP3 player is not recognized when connected as an external device.
- External USB devices may not be recognized, depending on the state of the external USB device.
- Only products with byte/sectors formatted at 4 KB or lower are recognized.
- Only USB devices in FAT12/16/32 format are recognized; NTFS and ExFAT file systems are not recognized.
- Some USB devices are not recognized due to compatibility issues. (Continued)

#### (Continued)

- Do not touch the USB connections.
- Connecting and disconnecting USB devices rapidly over a short period of time can cause equipment failure.
- Abnormal sounds may be audible when the USB device is disconnected.
- Turn the audio off before connecting or disconnecting external USB devices.
- Recognition may take longer depending on the type, capacity or file format of the external USB device. This is not a product malfunction.
- Use of USB devices for purposes other than playing music files is prohibited.
- Image display and video playback are not supported.
- Use of USB accessories, including charge and heat though the USB I/F, can lead to reduced product performance or malfunctions. Do not use USB devices or accessories for these purposes.

(Continued)

(Continued)

- Use of aftermarket USB hubs and extension cables can result in the vehicle's audio system failing to recognize your USB device. Connect the USB device directly to the multimedia port of your vehicle.
- When using high-capacity USB devices with logical drive divisions, only files saved on the highest level logical drive can be played.

If applications are loaded on a USB drive, file playback may fail.

- Some MP3 players, cell phones, digital cameras, etc. (USB devices that are not recognized as mobile storage) may not operate normally when connected.
- USB charging may not be supported by some mobile devices.
- Operation is guaranteed only for standard (Metal Cover Type) USB Memory drives.
- Operation of HDD, CF, SD and memory stick devices is not guaranteed.
- DRM (Digital Rights Management) files cannot be played.

(Continued)

(Continued)

- SD-type USB memory, CF-type USB memory, and other USB memory devices that require adapters for connection are not supported.
- Proper operation of USB HDDs or USB drives with connectors that loosen due to vehicle vibrations is not guaranteed. (iStick, etc.)
- USB products that are used as key chains or cell phone accessories may damage the USB jack and affect proper file play-

back. Please refrain from use. Use only products with plug connectors, as shown in the following illustration.

- When MP3 devices or cell phones are connected simultaneously through BT Audio and USB modes, a popping noise or malfunction may occur.
- Use USB 2.0 devices for better compatibility. Maximum device size supported is 32 GB.

#### USB



#### (1) Repeat Enable/disable repeat play.

(2) Shuffle Enable/disable shuffle play.

(3) List View a list of all songs.

(4) Menu Navigate to the menu screen.

(5) Album Image View song info.

## (6) Pause

Pause or play music.

#### (7) Playback progress Select to skip to the desired location.

#### Playback

- Press the [MEDIA] button, and select [USB].
- Connect a USB drive to the USB port to automatically play files on the USB drive.

#### **Changing songs**

- Press the [SEEK/TRACK] button to play the previous or next song.
- Press and hold the **[SEEK/TRACK]** button to rewind or fast forward the currently playing song.
- Search songs by turning **TUNE** knob, and press the knob to play.

US8	12:00 M	
🛿 List		Ð
,⊐ File		
Artists		
Q Songs		
Albums		×.

#### Selecting songs from a list

Select [List] to see a list of songs available for play.

Select and play the desired song.

#### **Playing repeatedly**

On the USB mode screen, select [Repeat]. The repeat play mode changes each time you press it. The corresponding mode icon will be displayed on the screen.

### **\* NOTICE**

The repeat folder function is available only when songs are playing from the [File] category under [List].

#### Playing in random order

On the USB mode screen, select [Shuffle]. The shuffle play mode is activated or deactivated each time you press it. When you activate the shuffle mode, the corresponding mode icon will be displayed on the screen.

#### Menu

- Information: Detailed information on the currently playing song is displayed.
- Sound Settings: Audio sound settings can be changed.

#### \* NOTICE - Using the iPod® Devices

- To use the audio system's iPod<sup>®</sup> control function, use the dedicated cable provided with your iPod<sup>®</sup>.
- Connecting the iPod® to the vehicle during play may result in a loud noise that lasts about one to two seconds. Connect the iPod® to the vehicle after stopping or pausing play.
- Connect the iPod<sup>®</sup> with the vehicle in the ACC ON state to begin charging.
- When connecting the iPod<sup>®</sup> cable, be sure to fully push the cable into the port.
- When Equalizer effects are enabled simultaneously on external devices, such as iPod®s and the audio system, the Equalizer effects may overlap, causing sound quality deterioration or distortion. Deactivate the Equalizer function for all external devices, if possible.
- Noise may occur when your iPod<sup>®</sup> or the AUX port is connected. Disconnect and store separately when not in use. (Continued)

(Continued)

- There may be noise if the audio system is used with an iPod® or AUX external device connected to the power jack. In these cases, disconnect the iPod® or external device from the power jack.
- Play may be interrupted, or device malfunctions may occur depending on the characteristics of your iPod<sup>®</sup>/ iPhone<sup>®</sup>.
- Play may fail if your iPhone<sup>®</sup> is connected through both Bluetooth<sup>®</sup> and USB. In this case, select Dock connector or Bluetooth<sup>®</sup> on your iPhone<sup>®</sup> to change the sound output settings.
- If your software version does not support the communication protocol or your iPod<sup>®</sup> is not recognized due to device failure, anomalies or defects, iPod<sup>®</sup> mode cannot be used.
- iPod<sup>®</sup> nano (5th generation) devices may not be recognized if the battery is low. Charge sufficiently before use.

(Continued)

#### (Continued)

- The search and song play order in the iPod<sup>®</sup> device may be different from the search order in the audio system.
- If the iPod<sup>®</sup> has failed due to an internal defect, please reset the iPod<sup>®</sup> (consult your iPod<sup>®</sup> manual).
- Depending on the software version, the iPod® may fail to sync with the system. If the media is removed or disconnected before recognition, the previous mode may not be restored (iPad® cannot be charged).
- Cables other than the 1-meter cable provided with iPod®/iPhone® products may not be recognized.
- When other music apps are used on your iPod<sup>®</sup>, the system sync function may fail due to malfunction of the iPod<sup>®</sup> application.

#### *iPod*<sup>®</sup>



(1) Repeat Enable/disable repeat play.

(2) Shuffle Enable/disable shuffle play.

(3) List View a list of all songs.

(4) Menu Navigate to the menu screen.

(5) Album Image View song info.

(6) Pause Pause or play music.

(7) Playback progressSelect to skip to the desired location.

#### Playback

• Connect your iPod<sup>®</sup> to the audio USB port, press the **[MEDIA]** button, and select [iPod].

## **\* NOTICE**

- When you connect an Apple device, playback does not start automatically.
- În iPod<sup>®</sup> Mode, song (file) lists are not supported if music is played using the Music application after connecting the iPod<sup>®</sup>.

#### **Changing songs**

- Press the [SEEK/TRACK] button to play the previous or next song.
- Press and hold the [SEEK/TRACK] button to rewind or fast forward the currently playing song.
- Search songs by turning the **TUNE** knob, and press the knob to play.

#### Selecting songs from a list

Select [List] to see a list of songs available for play. Select and play the desired song.

#### **Playing repeatedly**

On the iPod<sup>®</sup> mode screen, select [Repeat]. The repeat play mode changes each time you press it. The corresponding mode icon will be displayed on the screen.

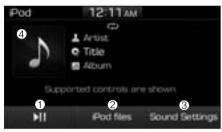
#### Playing in random order

On the iPod<sup>®</sup> mode screen, select [Shuffle]. The shuffle play mode is activated or deactivated each time you press it. When you activate the shuffle mode, the corresponding mode icon will be displayed on the screen.

#### Menu

- Information: Detailed info on the currently playing song is displayed.
- Sound Settings: Audio sound settings can be changed.

#### When other music programs are running



When songs saved on your iPod<sup>®</sup> are playing through a separate music app, the above screen is displayed.

- (1) Play/Pause: Pause or play music.
- (2) iPod files: Play music saved on your iPod<sup>®</sup>.
- (3) Sound Settngs: Audio sound settings can be changed.
- (4) Album Image: View playback info.

#### **Playing iPod files**

 Select [iPod files] to play songs saved on your iPod<sup>®</sup>.

If there are no songs saved on your  $i\text{Pod}^{\textcircled{B}},$  the [iPod files] is disabled.

#### **\* NOTICE**

Operation cannot be carried out correctly due to iPod<sup>®</sup> application malfunction.

#### \* NOTICE - Using Bluetooth<sup>®</sup> (BT) Audio

- Bluetooth<sup>®</sup> Audio mode can only be used if a Bluetooth<sup>®</sup>-enabled phone is connected. Only devices that support Bluetooth<sup>®</sup> audio can be used.
- If the Bluetooth®-enabled phone is disconnected during play, the music stops.
- When the TRACK UP/DOWN buttons are used during Bluetooth<sup>®</sup> audio streaming, a popping noise or sound interruptions may occur, depending on the cell phone device.
- Depending on the cell phone model, the audio streaming function may not be supported.
- If a phone call is made or received when music is playing in Bluetooth<sup>®</sup> Audio mode, the call may mix with the music.
- When returning to Bluetooth<sup>®</sup> Audio mode after ending a call, play might not resume automatically for some cell phone models.

## **!** CAUTION

- Bluetooth<sup>®</sup> Handsfree is a feature that enables drivers to practice safe driving. Connecting the car audio system with a Bluetooth<sup>®</sup> phone allows the user to conveniently make calls, receive calls, and manage the phone book. Before using the Bluetooth<sup>®</sup> Wireless Technology, carefully read the contents of this user's manual.
- Excessive use or operations while driving may lead to negligent driving practices and be the cause of accidents.
- Do not operate the device excessively while driving.
- Viewing the screen for prolonged periods of time is dangerous and may lead to accidents.
- When driving, view the screen only for short periods of time.

#### Bluetooth® (BT) Audio



(1) Repeat Enable/disable repeat play.

(2) Shuffle Enable/disable shuffle play.

(3) Menu Navigate to the menu screen.

(4) Play/Pause Pause or play music.

#### **\* NOTICE**

- Depending on the connected Bluetooth device, mobile phone, or the music player you are using, playback controls may differ.
- Depending on the music player you are using, streaming may not be supported.
- Some cell phone models may not support particular functions.
- Bluetooth<sup>®</sup> audio volume is synced with cell phone media volume.

#### Playback

• Press the [MEDIA] button, and select [BT Audio].

#### **Changing songs**

• Press the [SEEK/TRACK] button to play the previous or next song.

#### **\* NOTICE**

Some cell phones may not support this function.

#### **Playing repeatedly**

On the Bluetooth<sup>®</sup> (BT) Audio mode screen, select [Repeat]. The repeat play mode changes each time you press it. The corresponding mode icon will be displayed on the screen.

#### **\* NOTICE**

The repeat play function is engaged, depending on the operation of the connected Bluetooth $^{(8)}$  device.

#### Playing in random order

On the Bluetooth<sup>®</sup> (BT) Audio screen, select [Shuffle]. The shuffle play mode is activated or deactivated each time you press it. When you activate the shuffle mode, the corresponding mode icon will be displayed on the screen.

#### **\* NOTICE**

The shuffle function is engaged, depending on the operation of the connected Bluetooth<sup>®</sup> device.

#### Menu

Select [Menu], and select the desired function.

- Connections: The currently connected Bluetooth<sup>®</sup> device can be changed.
- Information: Detailed information on the currently playing song is displayed.
- Sound Settings: Audio sound settings can be changed.

#### AUX



#### Running AUX

- Press the [MEDIA] button, and select [AUX].
- Connect the external device connection jack to the AUX terminal to run AUX.
- (1) Sound Settings: Audio sound settings can be changed.

## Phone

#### \* NOTICE - Using Bluetooth® (BT) Phone

- Bluetooth<sup>®</sup> is a near-field wireless networking technology that uses the 2.4 GHz frequency to connect various devices within a certain distance wirelessly.
- The technology is used in PCs, peripherals, Bluetooth<sup>®</sup> phones, tablet PCs, household appliances and automobiles. Devices supporting Bluetooth<sup>®</sup> can exchange data at high speeds without physical cable connections.
- Bluetooth<sup>®</sup> Handsfree devices enable convenient access to phone functions through cell phones equipped with Bluetooth<sup>®</sup>.
- Some Bluetooth<sup>®</sup> devices may not be supported by the Bluetooth<sup>®</sup> Handsfree function.
- When Bluetooth<sup>®</sup> is connected and calls are attempted through a connected cell phone from outside the vehicle, the call is connected through the Bluetooth<sup>®</sup> Handsfree function of the vehicle.

(Continued)

• Please be sure to disconnect the Bluetooth<sup>®</sup> Handsfree function through your Bluetooth<sup>®</sup> device or the audio screen.

Safety precautions

- The Bluetooth<sup>®</sup> Handsfree function helps drivers to drive safely. By connecting a Bluetooth<sup>®</sup>-enabled phone to the vehicle's audio system, phone calls can be made and received through the audio system and contacts can be managed. Consult the user manual before use.
- Excessive manipulation of controls while driving, making it difficult to pay attention to the road ahead, can lead to accidents. Do not operate the device excessively while driving.
- Looking at the screen for a prolonged time increases the risk of accidents. Keep time spent looking at the screen to a minimum.

# Precautions when connecting Bluetooth® devices

- The vehicle supports the following Bluetooth<sup>®</sup> functions. Some Bluetooth<sup>®</sup> devices may not support some functions.
  - 1) Bluetooth<sup>®</sup> Handsfree phone calls.
  - 2) Operations during a call(Private, Switch, Mic Vol. controls).
  - Download call history saved to the Bluetooth<sup>®</sup> device.
  - Download contacts saved to the Bluetooth<sup>®</sup> device.
  - Automatic contacts/call history download when Bluetooth<sup>®</sup> is connected.
  - 6) Automatic Bluetooth<sup>®</sup> device connection when the vehicle is started.
  - 7) Bluetooth® audio streaming playback.
- Before connecting the audio system to your device, make sure your device supports Bluetooth<sup>®</sup>.

(Continued)

- Even if your device supports Bluetooth<sup>®</sup>, a Bluetooth<sup>®</sup> connection cannot be established if the device's Bluetooth<sup>®</sup> function is switched off. Search and connect with the Bluetooth<sup>®</sup> function enabled.
- Pair or connect Bluetooth<sup>®</sup> devices to the audio system with the vehicle at a standstill.
- If a Bluetooth<sup>®</sup> connection is lost due to abnormal conditions while a Bluetooth<sup>®</sup> device is connected (communication range exceeded, device power OFF, communication errors, etc.), the disconnected Bluetooth<sup>®</sup> device is searched for and automatically reconnected.
- If you want to disable the Bluetooth<sup>®</sup> device auto-connect function, turn the Bluetooth<sup>®</sup> function OFF on your device. Consult the user manuals for individual devices to see whether Bluetooth<sup>®</sup> is supported.
- Handsfree call quality and volume may vary depending on the type of Bluetooth<sup>®</sup> device.

- Some Bluetooth<sup>®</sup> devices are subject to intermittent Bluetooth<sup>®</sup> connection failures. In this case, use the following method.
  - Turn the Bluetooth<sup>®</sup> function off on your Bluetooth<sup>®</sup> device → Turn it on and try again.
  - Delete the paired device from both the audio system and Bluetooth<sup>®</sup> device, then pair again.
  - Power down your Bluetooth<sup>®</sup> device → Turn it on and try again.
  - Completely remove the battery from your Bluetooth<sup>®</sup> device; reinsert it, reboot, and attempt connection.
  - 5) Restart the vehicle and reattempt connection.

## **\* NOTICE**

Maximum power output of Bluetooth is 3mW.

#### Pairing a Bluetooth<sup>®</sup> device Information on pairing Bluetooth<sup>®</sup> devices

- Pairing refers to the process of pairing Bluetooth<sup>®</sup> cell phones or devices with the system prior to connection. This is a necessary procedure for Bluetooth<sup>®</sup> connection and usage.
- Up to five devices can be paired.
- Pairing Bluetooth<sup>®</sup> device is not allowed while vehicle is moving.

#### Pairing the first Bluetooth<sup>®</sup> device Press the [PHONE] button on the audio system or the [CALL] button on the steering wheel remote control → Search for the vehicle from the Bluetooth<sup>®</sup> device, and pair → Enter the passkey on the Bluetooth<sup>®</sup> device or approve passkey → Bluetooth<sup>®</sup> pairing completed.

1. When the **[PHONE]** button on the audio or the **[CALL]** button on the steering wheel remote control is pressed, the following screen is displayed. Devices can now be paired.



(1) Vehicle name: Searched name in Bluetooth<sup>®</sup> device.

## **\* NOTICE**

The vehicle name in the image above is an example. Refer to your device for the actual name of your device.

- Search for available Bluetooth<sup>®</sup> devices in the Bluetooth<sup>®</sup> menu of your Bluetooth<sup>®</sup> device(cell phone, etc.).
- 3. Confirm that the vehicle name in your Bluetooth<sup>®</sup> device matches the vehicle name shown on the audio screen, then select it.

- 4-1. For devices that require passkey entry, a passkey entry screen is shown on your Bluetooth<sup>®</sup> device.
  - Enter the passkey '0000', in your Bluetooth<sup>®</sup> device.
- 4-2. For devices that require passkey confirmation, the following screen is shown on the audio system. A 6-digit passkey input screen is shown in the Bluetooth<sup>®</sup> device.



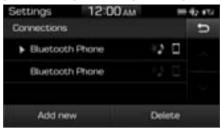
 After confirming that the 6-digit passkey on the audio screen and the Bluetooth<sup>®</sup> device are identical, select [OK] in your Bluetooth<sup>®</sup> device.

## **\* NOTICE**

The 6-digit passkey in the image above is an example. Refer to your vehicle for the actual passkey.

#### Pairing a second Bluetooth<sup>®</sup> device

Press the **[SETUP]** button on the audio system → Select [Bluetooth] → Select [Connections] → Select [Add new].



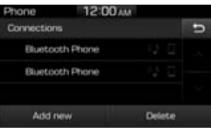
- The pairing procedure from this point is identical to [Pairing the first Bluetooth device].

## **\* NOTICE**

- Bluetooth<sup>®</sup> standby mode lasts for three minutes. If a device is not paired within three minutes, pairing is canceled. Start over from the beginning.
- For most Bluetooth<sup>®</sup> devices, a connection is established automatically after pairing. Some devices, however, require separate confirmation when connecting after pairing. Be sure to check your Bluetooth<sup>®</sup> device after pairing to confirm that it has connected.

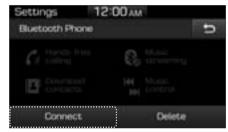
#### Connecting Bluetooth<sup>®</sup> devices If there are no connected devices

Press the **[PHONE]** button on the audio system or the **[CALL]** button in the steering wheel remote control → List of paired Bluetooth<sup>®</sup> devices → Select the desired Bluetooth<sup>®</sup> device from the list → Connect Bluetooth<sup>®</sup>.



#### If there are connected devices

Press the **[PHONE]** button on the audio system → Select [Settings] → Select [Connections] → Select Bluetooth<sup>®</sup> device to connect → Select [Connect] → Connect Bluetooth<sup>®</sup>.



## **\* NOTICE**

- Only one Bluetooth<sup>®</sup> device can be connected at a time.
- When a Bluetooth<sup>®</sup> device is connected, other devices cannot be paired.

Accepting/rejecting phone calls Receiving phone calls with Bluetooth<sup>®</sup> connected.



- Caller name: If the caller number is in your contacts, the corresponding name is displayed.
- (2) Incoming phone number: Incoming phone number is displayed.
- (3) Accept: Accept call.
- (4) Reject: Reject call.

## **\* NOTICE**

- When the incoming call screen is displayed, audio mode and the settings screen cannot be shown. Only call volume control is supported.
- Some Bluetooth<sup>®</sup> devices may not support the call reject function.
- Some Bluetooth<sup>®</sup> devices may not support the phone number display function.

## Operation during calls

Incoming call with Bluetooth<sup>®</sup> connected Select [Accept].



- (1) Call duration: Call duration display.
- (2) Caller name: If the caller number is in your contacts, the corresponding name is displayed.
- (3) Incoming phone number: Incoming phone number is displayed.
- (4) Keypad: Number keypad for Automatic Response Service input is displayed.
- (5) Private: Call is transferred to a cell phone.
- (6) Microphone Volume(Outgoing Volume): Adjust outgoing voice volume.
- (7) End: End call.

## **\* NOTICE**

- Some Bluetooth<sup>®</sup> devices may not support the Private function.
- The outgoing voice volume may vary depending on the type of Bluetooth<sup>®</sup> device. If the outgoing voice volume is too high or low, adjust the Microphone Volume (Outgoing Volume).

## Favourites

Press the **[PHONE]** button on the audio system → Select [Favourites] → Favourites list displayed.



(1) Favourites list: A list of paired favourite is displayed.

Connect a call when selected.

- (2) Edit favourites: Edit a downloaded phone number to favourites.
- (3) Delete: Delete a saved favourite.

## **\* NOTICE**

- Up to 20 favourites can be saved for each connected Bluetooth<sup>®</sup> device.
- Favourites can be accessed when the Bluetooth<sup>®</sup> device they were paired from is connected.
- The audio system does not download favourites from Bluetooth<sup>®</sup> devices. Favourites must be newly saved before use.
- To add to favourites, contacts must be downloaded first.
- Saved favourites are not updated even if the contacts of the connected Bluetooth<sup>®</sup> device are changed. In this case, favourites need to be deleted and added again.

#### Call history

Press the [PHONE] button on the audio system → Select [Call history] → Call history is displayed.

Phone	12:00 AM	=	12.00
All calls [124]			5
1 🛱 John Smith		12:08	-
& Scott Davis		12:07	_
6 0123456785 2	80	10.12	Y
Sort by		3 Download	

(1) Call history: Display the downloaded call history list. Connect a call when selected

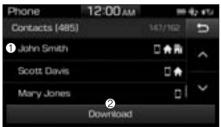
- (2) Sort by: Sort by all calls, dialled calls, received calls or missed calls.
- (3) Download: Download call history from connected Bluetooth® devices.

## **\* NOTICE**

- Up to 50 dialled, received and missed calls are saved.
- When the latest call history is received, the existing call history is deleted.

## Contacts

Press the [PHONE] button on the audio system - Select [Contacts] - Select letter(ABC) - Contacts displayed.



(1) Contacts: Display downloaded contacts.

Connect a call when selected

(2) Download: Download contacts from connected Bluetooth® devices.

## **\* NOTICE**

- Only supported contacts format can be downloaded and displayed from the Bluetooth device, contacts from some applications will not be included.
- Up to 2,000 contacts can be saved.
- In some cases, additional confirmation from your Bluetooth® device is necessary when downloading contacts. If downloading of contacts unsuccessful, consult your Bluetooth® device's settings or the audio screen to approve the download.
- Contacts without phone numbers are not displayed.

#### Dial

Press the **[PHONE]** button on the audio → Select [Dial].



- (1) Phone number entry window: The phone number entered using the keypad is displayed.
- (2) Clear
  - Select to delete individual digits.
  - Press and hold to delete the entire phone number.
- (3) Keypad: Enter phone number.
- (4) Bluetooth® Phone name
  - The name of the connected Bluetooth<sup>®</sup> device is displayed.
  - Contacts matching the keypad number/letter input are displayed.

## (5) Call

- Enter and select a phone number to call.
- Select without entering a phone number to see the most recent dialed call.

#### Settings

Press the [PHONE] button on the audio

- ➡ Select [Settings].
- For phone settings, refer to Setup page.

## Setup



Access Display, Sound, Date/Time, Bluetooth, System, Screensaver and Display Off settings.

Press the **[SETUP]** button on the audio system.

#### Display

Press the **[SETUP]** button on the audio system → Select [Display].

- Dimming mode(Mode): Set the screen brightness to be adjusted automatically according to ambient lighting conditions or set the screen to stay bright or dark continuously.
- Brightness(Illumination): The brightness of the audio screen can be changed.
- Text Scroll: If text is too long to be displayed on the screen, enable the text scroll function. (if equipped)

## Sound

Press the **[SETUP]** button on the audio system → Select [Sound].

- Position: Sound balance and fader can be adjusted.
- Equaliser(Tone): Sound tone color can be adjusted.
- Rear parking sensors prioritised (Back-up Warning Priority): Automatically lower audio volume while reversing.
- Speed dependent volume control: Automatically adjust volume based on vehicle speed.
- Beep: Select whether to play a beep sound when the screen is touched.

#### Date/Time

Press the **[SETUP]** button on the audio system → Select [Date/Time].

- Set time: Set the time displayed on the audio screen.
- Time format: Choose between 12-hour and 24-hour time formats.
- Set date: Set the date displayed on the audio screen.

#### Bluetooth

Press the **[SETUP]** button on the audio system → Select [Bluetooth].

- Connections: Control pairing, deletion, connection and disconnection of Bluetooth<sup>®</sup> devices.
- Auto connection priority: Set the connection priority of Bluetooth<sup>®</sup> devices when the vehicle is started.
- Update contacts: Contacts can be downloaded from connected Bluetooth<sup>®</sup> devices.
- Bluetooth voice guidance: Play or mute voice prompts for Bluetooth<sup>®</sup> device pairing, connection and errors. (if equipped)

## **\* NOTICE**

- When paired devices are deleted, the call history and contacts of the device saved to the audio system are deleted.
- For Bluetooth<sup>®</sup> connections with low connection priority, some time may be required for the connection to be established.
- Contacts can be downloaded only from the currently connected Bluetooth<sup>®</sup> device.
- If no Bluetooth<sup>®</sup> device is connected, the Download Contacts button is disabled.
- If the language setting is Slovakian, Bluetooth voice guidance is not supported. (if equipped)

#### System

Press the **[SETUP]** button on the audio system → Select [System].

- Language: Change the user language.
- Default: Reset the audio system.

## **\* NOTICE**

The system resets to the default values, and all saved data and settings are lost.

#### Screensaver

Set the information displayed when the audio system is switched off or the screen is turned off.

Press the **[SETUP]** button on the audio system - Select [Screensaver].

- Analogue: An analog clock is displayed.
- Digital: A digital clock is displayed.
- None: No information is displayed.

#### Display Off

To prevent glare, the screen can be turned off with the audio system in operation.

Press the **[SETUP]** button on the audio system → Select [Display Off].

## **\* NOTICE**

Use 'Screensaver' to set the information to be displayed when the screen is turned off.

# **Declaration of Conformity**

## CE for EU

EU Declaration of Conformity.				
Product details				
Predat of	SHEETINA, LIMA AND CONTROL			
-	ACCOMP. ACLIDING. ACLIDING. ACLIDING. ACLIDING. ACLIDING. ACLIDING ACLIDING. ACLIDING. ACLIDING.			
Re having series, that	fre product above 1.0 compliance wit an of a	the exertial reactioners	of the Directive	
Applied Mandards				
Article = 1.3 Robot =	0.001007111.0000.0017117			
Avenue - 1.10 INC.a	EN 101 AND A VELT, DA MELAND OF VELT, AN UNIT 2001, AN UNIT 2017			
Article = 8.1a Safety, Neglith	(* 1001-014, (* 411)-008			
Matufacturer		Representative in the SU		
Parallel BORD (a., 510		MORE Parts Surger N.O.		
201, foliai an-ri, Kongharti gu,		Without Foy Brans 11,		
News, MILITS, Rowan		President Mark, \$2008, Germany		
fair will be been after		Test with emulations to build		
Red Field Series		Squad Barro	00000,0004	
Inervicies.		Printerstory of Land	weeky is instead under the set	
175 Montagine Department	es Milphon,	sequencially of the inst	estature: us	
LA MINEL VIA			Inurgitizet One	
Autoficial Reals Interestinguistics		利韵	Ingenerication	
Advance			Preside bellets (a., and	

## FCC

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

Caution: Any changes or modifications to this device not expressly approved by the party responsible for compliance could void your authority to operate the equipment.

This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment.

This equipment should be installed and operated with minimum 20 cm between the radiator and your body. This transmitter must not be collocated or operating in conjunction with any other antenna or transmitter unless authorized to do so by the FCC.

## **ANATEL** for Brazil

"Este produto está homologado pela ANATEL, de acordo com os procedimentos regulamentados pela resolução nº . 242/2000 e atende aos requisitos técnicos e aplicados"

"Este equipamento opera em caráter secundário, isto é, não tem direito a proteção contra interferência prejudicial, mesmo de estações do mesmo tipo, e não pode causar interferência a sistemas operando em caráter primário,"

Para maiores informações, consulte o site da ANATEL www.anatel.gov.br



Modelo ACB10DFGN

Before driving / 5-3 Key positions / 5-5 Engine start/stop button / 5-9 Idle stop and go (ISG) system / 5-15 Manual transaxle / 5-20 Dual clutch transmission (DCT) / 5-23 Drive mode integrated control system / 5-32 Electronic control suspension (ECS) / 5-34 Brake system / 5-35 Forward collision-avoidance assist (FCA) system / 5-54

# Driving your vehicle

Cruise control system / 5-66 Speed limit control system / 5-71 Intelligent speed limit warning (ISLW) system / 5-74 Lane keeping assist (LKA) system / 5-79 Economical operation / 5-86 Special driving conditions / 5-88 Winter driving / 5-92 Trailer towing / 5-96 Vehicle weight / 5-105 5

## **WARNING - ENGINE EXHAUST CAN BE DANGEROUS!**

Engine exhaust fumes can be extremely dangerous. If, at any time, you smell exhaust fumes inside the vehicle, open the windows immediately.

## • Do not inhale exhaust fumes.

Exhaust fumes contain carbon monoxide, a colorless, odorless gas that can cause unconsciousness and death by asphyxiation.

#### • Be sure the exhaust system does not leak.

The exhaust system should be checked whenever the vehicle is raised to change the oil or for any other purpose. If you hear a change in the sound of the exhaust or if you drive over something that strikes the underneath side of the car, we recommend that the system be checked by an authorized HYUNDAI dealer.

#### • Do not run the engine in an enclosed area.

Letting the engine idle in your garage, even with the garage door open, is a hazardous practice. Never run the engine in your garage any longer than it takes to start the engine and back the vehicle out.

## • Avoid idling the engine for prolonged periods with people inside the vehicle.

If it is necessary to idle the engine for a prolonged period with people inside the vehicle, be sure to do so only in an open area with the air intake set at "Fresh" and fan operating at one of the higher speeds so fresh air is drawn into the interior.

If you must drive with the tailgate/trunk open because you are carrying objects that make this necessary:

1. Close all windows.

2. Open side vents.

3. Set the air intake control at "Fresh", the air flow control at "Floor" or "Face" and the fan at one of the higher speeds.

To assure proper operation of the ventilation system, be sure the ventilation air intakes located just in front of the windshield are kept clear of snow, ice, leaves or other obstructions.

## **BEFORE DRIVING**

## Before entering vehicle

- Be sure that all windows, outside mirror(s), and outside lights are clean.
- Check the condition of the tires.
- Check under the vehicle for any sign of leaks.
- Be sure there are no obstacles behind you if you intend to back up.

## Necessary inspections

Fluid levels, such as engine oil, engine coolant, brake fluid, and washer fluid should be checked on a regular basis, with the exact interval depending on the fluid. Further details are provided in section 7, "Maintenance".

# **A** WARNING

Driving while distracted can result in a loss of vehicle control, that may lead to an accident, severe personal injury, and death. The driver's primary responsibility is in the safe and legal operation of a vehicle, and use of any handheld devices, other equipment, or vehicle systems which take the driver's eyes, attention and focus away from the safe operation of a vehicle or which are not permissible by law should never be used during operation of the vehicle.

## **Before starting**

- Close and lock all doors.
- Position the seat so that all controls are easily reached.
- Adjust the inside and outside rearview mirrors.
- Be sure that all lights work.
- · Check all gauges.
- Check the operation of warning lights when the ignition switch is turned to the ON position.
- Release the parking brake and make sure the brake warning light goes out.

For safe operation, be sure you are familiar with your vehicle and its equipment.

# A WARNING

All passengers must be properly belted whenever the vehicle is moving. Refer to "Seat belts" in section 3 for more information on their proper use.

# **A** WARNING

Always check the surrounding areas near your vehicle for people, especially children, before putting a vehicle into "D (Drive)" or "R (Reverse)".

## WARNING - Driving under the influence of alcohol or drugs

Drinking and driving is dangerous. Drunk driving is the number one contributor to the highway death toll each year. Even a small amount of alcohol will affect your reflexes, perceptions and judgement. Driving while under the influence of drugs is as dangerous or more dangerous than driving drunk.

You are much more likely to have a serious accident if you drink or take drugs and drive.

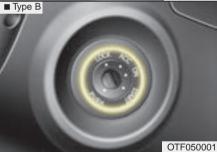
If you are drinking or taking drugs, don't drive. Do not ride with a driver who has been drinking or taking drugs. Choose a designated driver or call a cab.

## A WARNING

- When you intend to park or stop the vehicle with the engine on, be careful not to depress the accelerator pedal for a long period of time. It may overheat the engine or exhaust system and cause fire.
- When you make a sudden stop or turn the steering wheel rapidly, loose objects may drop on the floor and it could interfere with the operation of the foot pedals, possibly causing an accident. Keep all things in the vehicle safely stored.
- If you do not focus on driving, it may cause an accident. Be careful when operating what may disturb driving such as audio or heater. It is the responsibility of the driver to always drive safely.

## **KEY POSITIONS**





## Illuminated ignition switch

Whenever a front door is opened, the ignition switch will be illuminated for your convenience, provided the ignition switch is not in the ON position. The light will go off immediately when the ignition switch is turned on or go off after about 30 seconds when the door is closed.

# Ignition switch position

## LOCK

The steering wheel locks to protect against theft. The ignition key can be removed only in the LOCK position.

## ACC (Accessory)

The steering wheel is unlocked and electrical accessories are operative.

## **\* NOTICE**

If difficulty is experienced turning the ignition switch to the ACC position, turn the key while turning the steering wheel right and left to release the tension.

## ON

The warning lights can be checked before the engine is started. This is the normal running position after the engine is started

Do not leave the ignition switch ON if the engine is not running to prevent battery discharae.

#### START

Turn the ignition key to the START position to start the engine. The engine will crank until you release the key; then it returns to the ON position. The brake warning lamp can be checked in this position.

# **A WARNING - Ignition key**

 NEVER turn the ignition switch to the LOCK or ACC position while the vehicle is in motion except in an emergency.

This will result in the engine turning off and loss of power assist for the steering and brake systems. This may lead to loss of directional control and braking function, which could cause an accident.

- The anti-theft steering column lock (if equipped) is not a substitute for the parking brake. Before leaving the driver's seat, always make sure the shift lever is engaged in 1<sup>st</sup> gear for the manual transaxle or P (Park) for the dual clutch transmission, set the parking brake fully and shut the engine off. Unexpected and sudden vehicle movement may occur if these precautions are not taken.
- Never reach for the ignition switch, or any other controls through the steering wheel while the vehicle is in motion. The presence of your hand or arm in this area could cause a loss of vehicle control, an accident and serious bodily injury or death.

#### (Continued)

• Do not place any movable objects around the driver's seat as they may move while driving, interfere with the driver and lead to an accident.

## Starting the engine

## **A** WARNING

- Always wear appropriate shoes when operating your vehicle. Unsuitable shoes (high heels, ski boots,etc.) may interfere with your ability to use the brake and accelerator pedal, and clutch (if equipped).
- Do not start the vehicle with the accelerator pedal depressed. The vehicle can move and lead to an accident.
- Wait until the engine rpm is normal. The vehicle may suddenly move if the brake padel is released when the rpm is high.

## \* NOTICE - Kick down mechanism

If your vehicle is equipped with a kick down mechanism in the accelerator pedal, it prevents you from driving at full throttle unintentionally by making the driver require increased effort to depress the accelerator pedal. However, if you depress the pedal more than approximately 80%, the vehicle can be at full throttle and the accelerator pedal will be easier to depress. This is not a malfunction but a normal condition.

(Continued)

#### Starting the gasoline engine

- 1. Make sure the parking brake is applied.
- 2. **Manual Transaxle** Depress the clutch pedal fully and shift the transaxle into Neutral. Keep the clutch pedal and brake pedal depressed while turning the ignition switch to the start position.
- 3. Turn the ignition switch to START and hold it there until the engine starts (a maximum of 10 seconds), then release the key.

# It should be started **without depressing** *the accelerator pedal.*

4. Do not wait for the engine to warm up while the vehicle remains stationary. Start driving at moderate engine speeds. (Steep accelerating and decelerating should be avoided.)

# ! CAUTION

If the engine stalls while you are in motion, do not attempt to move the shift lever to the P (Park) position. If traffic and road conditions permit, you may put the shift lever in the N (Neutral) position while the vehicle is still moving and turn the ignition switch to the START position in an attempt to restart the engine.

# ! CAUTION

- Do not engage the starter for more than 10 seconds. If the engine stalls or fails to start, wait 5 to 10 seconds before re-engaging the starter. Improper use of the starter may damage it.
- Do not turn the ignition switch to the START position with the engine running. It may damage the starter.

#### Starting the diesel engine

To start the diesel engine when the engine is cold, it has to be pre-heated before starting the engine and then have to be warmed up before starting to drive.

- 1. Make sure the parking brake is applied.
- 2. **Manual Transaxle** Depress the clutch pedal fully and shift the transaxle into Neutral. Keep the clutch pedal and brake pedal depressed while turning the ignition switch to the start position.

**Dual clutch transmission** - Place the transaxle shift lever in P(park). Depress the brake pedal fully.

You can also start the engine when the shift lever is in the N(neutral) position.



W-60

- Turn the ignition switch to the ON position to pre-heat the engine. Then the glow indicator light will illuminate.
- 4. If the glow indicator light goes out, turn the ignition switch to the START position and hold it there until the engine starts (a maximum of 10 seconds), then release the key.

## **\* NOTICE**

If the engine does not start within 10 seconds after the preheating is completed, turn the ignition key once more to the LOCK position for 10 seconds, and then to the ON position, in order to preheat again.

# ! CAUTION

- Recommend to wait for the diesel engine to warm up while the vehicle remains stationary in winter for a while and drive.
- Recommend to use diesel fuel in a high altitude mountain or country where you visit in winter.

#### Starting and stopping the engine for turbocharger intercooler

- 1. Do not race or accelerate the engine immediately after starting.
- If the engine is cold, idle for several seconds before sufficient lubrication is ensured in the turbocharger unit.
- 2. After high speed or extended driving, requiring a heavy engine load, run the engine on idle condition about 1 minute before turning it off.

This idle time will allow the turbocharger to cool prior to shutting the engine off.

## ! CAUTION

Do not turn off the engine immediately after it has been subjected to a heavy load. Doing so may cause severe damage to the engine or turbo charger unit.

## **ENGINE START/STOP BUTTON (IF EQUIPPED)**



## Illuminated engine start/stop button

Whenever the front door is opened, the engine start/stop button will illuminate for vour convenience. The light will go off after about 30 seconds when the door is closed. It will also go off immediately when the theft-alarm system is armed.

Engine start/stop button position OFF



#### With manual transaxle

To turn off the engine (START/RUN position) or vehicle power (ON position), stop the vehicle then press the engine start/stop button.

#### With dual clutch transmission

To turn off the engine (START/RUN position) or vehicle power (ON position), press the engine start/stop button with the shift lever in the P (Park) position. When you press the engine start/stop button without the shift lever in the P (Park) position, the engine start/stop button will not change to the OFF position but to the ACC position.

#### Vehicles equipped with anti-theft steering column lock

The steering wheel locks when the engine start/stop button is in the OFF position to protect you against theft. It locks when the door is opened.

If the steering wheel is not locked properly when you open the driver's door, the warning chime will sound. Try locking the steering wheel again. If the problem is not solved, we recommend that the system be checked by an authorized HYUNDAI dealer.

In addition, if the engine start/stop button is in the OFF position after the driver's door is opened, the steering wheel will not lock and the warning chime will sound. In such a situation. close the door. Then the steering wheel will lock and the warning chime will stop.

## **\* NOTICE**

If the steering wheel doesn't unlock properly, the engine start/stop button will not work. Press the engine start/stop button while turning the steering wheel right and left to release the tension.

# ! CAUTION

You are able to turn off the engine (START/RUN) or vehicle power (ON), only when the vehicle is not in motion. In an emergency situation while the vehicle is in motion, you are able to turn the engine off and to the ACC position by pressing the engine start/stop button for more than 2 seconds or 3 times successively within 3 seconds. If the vehicle is still moving, you can restart the engine without depressing the brake pedal by pressing the engine start/stop button with the shift lever in the N (Neutral) position.

## ACC(Accessory)



#### With manual transaxle

Press the engine start/stop button when the button is in the OFF position without depressing the clutch pedal.

#### With dual clutch transmission

Press the engine start/stop button while it is in the OFF position without depressing the brake pedal.

The steering wheel unlocks (if equipped with anti-theft steering column lock) and electrical accessories are operational. If the engine start/stop button is in the ACC position for more than 1 hour, the button is turned off automatically to prevent battery discharge. ΟΝ



## With manual transaxle

Press the engine start/stop button when the button is in the ACC position without depressing the clutch pedal.

#### With dual clutch transmission

Press the engine start/stop button while it is in the ACC position without depressing the brake pedal.

The warning lights can be checked before the engine is started. Do not leave the engine start/stop button in the ON position for a long time. The battery may discharge, because the engine is not running. START/RUN



Not illuminated

#### With manual transaxle

To start the engine, depress the clutch pedal and brake pedal, then press the engine start/stop button with the shift lever in the N (Neutral) position.

#### With dual clutch transmission

To start the engine, depress the brake pedal and press the engine start/stop button with the shift lever in the P (Park) or the N (Neutral) position. For your safe-ty, start the engine with the shift lever in the P (Park) position.

## **\* NOTICE**

If you press the engine start/stop button without depressing the clutch pedal for manual transaxle vehicles or without depressing the brake pedal for dual clutch transmission, the engine will not start and the engine start/stop button changes as follow:

 $OFF \rightarrow ACC \rightarrow ON \rightarrow OFF \text{ or } ACC$ 

## **\*** NOTICE

If you leave the engine start/stop button in the ACC or ON position for a long time, the battery will discharge.

# **A** WARNING

- NEVER press the Engine Start/ Stop button while the vehicle is in motion except in an emergency. This will result in the engine turning off and loss of power assist for the steering and brake systems. This may lead to loss of directional control and braking function, which could cause an accident.
- The anti-theft steering column lock (if equipped) is not a substitute for the parking brake. Before leaving the driver's seat, always make sure the shift lever is engaged in P (Park), set the parking brake fully and shut the engine off. Unexpected and sudden vehicle movement may occur if these precautions are not taken. (Continued)

## (Continued)

- Never reach for the engine start/ stop button or any other controls through the steering wheel while the vehicle is in motion. The presence of your hand or arm in the area could cause loss of vehicle control, an accident and serious bodily injury or death.
- Do not place any movable objects around the driver's seat as they may move while driving, interfere with the driver and lead to an accident.

## Starting the engine

# A WARNING

- Always wear appropriate shoes when operating your vehicle. Unsuitable shoes (high heels, ski boots,etc.) may interfere with your ability to use the brake and accelerator pedal.
- Do not start the vehicle with the accelerator pedal depressed. The vehicle can move and lead to an accident.
- Wait until the engine rpm is normal. The vehicle may suddenly move if the brake padel is released when the rpm is high.

#### Starting the gasoline engine

- 1. Carry the smart key or leave it inside the vehicle.
- 2. Make sure the parking brake is firmly applied.
- 3. **Manual Transaxle** Depress the clutch pedal fully and shift the transaxle into Neutral. Keep the clutch pedal and brake pedal depressed while starting the engine.
- 4. Press the engine start/stop button.

# It should be started **without depressing** *the accelerator.*

 Do not wait for the engine to warm up while the vehicle remains stationary.
 Start driving at moderate engine speeds. (Steep accelerating and decelerating should be avoided.)

#### Starting the diesel engine

To start the diesel engine when the engine is cold, it has to be pre-heated before starting the engine and then have to be warmed up before starting to drive.

- 1. Make sure the parking brake is applied.
- 2. **Manual Transaxle** Depress the clutch pedal fully and shift the transaxle into Neutral. Keep the clutch pedal and brake pedal depressed while starting the enigne.

**Dual clutch transmission** - Place the transaxle shift lever in P (Park). Depress the brake pedal fully.

You can also start the engine when the shift lever is in the N (Neutral) position.



W-60

- 3. Press the engine start/stop button while depressing the brake pedal.
- 4. Continue depressing the brake pedal until the illuminated glow indicator goes off. (approximately 5 seconds)
- 5. The engine starts running when the glow indicator goes off.

# **\* NOTICE**

If the engine start/stop button is pressed once more while the engine is pre-heating, the engine may start.

# ! CAUTION

- Recommend to wait for the diesel engine to warm up while the vehicle remains stationary in winter for a while and drive.
- Recommend to use diesel fuel in a high altitude mountain or country where you visit in winter.

Starting and stopping the engine for turbocharger intercooler

1. Do not race or accelerate the engine immediately after starting.

If the engine is cold, idle for several seconds before sufficient lubrication is ensured in the turbocharger unit.

 After high speed or extended driving, requiring a heavy engine load, idle the engine about 1 minute before turning it off.

This idle time will allow the turbocharger to cool prior to shutting the engine off.

# ! CAUTION

Do not turn the engine off immediately after it has been subjected to a heavy load. Doing so may cause severe damage to the engine or turbocharger unit.

- Even if the smart key is in the vehicle, if it is far away from you, the engine may not start.
- When the engine start/stop button is in the ACC position or above, if any door is opened, the system checks for the smart key. If the smart key is not in the vehicle, a message "Key is not in the vehicle" will appear on the LCD display. And if all doors are closed, the chime will sound for 5 seconds. The indicator or warning will turn off while the vehicle is moving. Always have the smart key with you.

# A WARNING

The engine will start, only when the smart key is in the vehicle.

Never allow children or any person who is unfamiliar with the vehicle touch the engine start/stop button or related parts.

# ! CAUTION

If the engine stalls while the vehicle is in motion, do not attempt to move the shift lever to the P (Park) position. If the traffic and road conditions permit, you may put the shift lever in the N (Neutral) position while the vehicle is still moving and press the engine start/stop button in an attempt to restart the engine.



## **\* NOTICE**

- If the battery is weak or the smart key does not work correctly, you can start the engine by pressing the engine start/stop button with the smart key.
- When the stop lamp fuse is blown, you cannot start the engine normally. Replace the fuse with a new one. If it is not possible, you can start the engine by pressing the engine start/stop button for 10 seconds while it is in the ACC position. The engine can start without depressing the brake pedal. But for your safety always depress the brake pedal before starting the engine.

# ! CAUTION

- Do not press the engine start/stop button for more than 10 seconds except when the stop lamp fuse is blown.
- Do not turn the ignition switch to the START position with the engine running. It may damage the starter.

## IDLE STOP AND GO (ISG) SYSTEM (IF EQUIPPED)

Your vehicle may be equipped with the ISG system, which reduces fuel consumption by automatically shutting down the engine, when the vehicle is at a standstill. (For example : red light, stop sign and traffic jam)

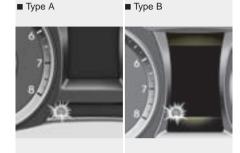
The engine starts automatically as soon as the starting conditions are met.

The ISG system is ON whenever the engine is running.

## **\* NOTICE**

When the engine automatically starts by the ISG system, some warning lights (ABS, ESC, ESC OFF, EPS or Parking brake warning light) may turn on for a few seconds.

This happens because of low battery voltage. It does not mean the system has malfunctioned.





OVF051030/OVF051068

## Auto stop

*To stop the engine in idle stop mode* M/T type

- 1. Decrease the vehicle speed to less than 5 km/h (3 mph).
- 2. Shift into N (Neutral) position.
- 3. Release the clutch pedal.

#### DCT type

- 1. Decrease the vehicle speed to 0 km/h.
- 2. Shift at D (Drive) / N (Neutral) position.
- 3. Release the brake pedal.

The engine will stop and the green AUTO STOP((A)) indicator on the instrument cluster will illuminate.

Also, a message "Auto Stop" will appear on the LCD display.

## **\* NOTICE**

You must reach a speed of at least 10 km/h (6 mph) since last idle stop. (with manual transaxle)

You must reach a speed of at least 8 km/h (5 mph) since last idle stop. (with DCT)

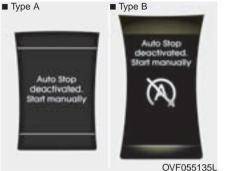


## **\* NOTICE**

If you unfasten the seatbelt or open the driver's door (or engine hood) in Auto Stop mode, the following will happen (with manual transaxle):

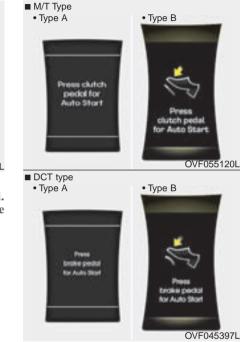
If you open the engine hood in Auto Stop mode, the following will happen (with DCT):

(Continued)



(Continued)

• A message "Auto Stop deactivated. Start Manually" will appear on the LCD display.



Auto start To restart the engine from idle stop mode

#### M/T type

- Press the clutch pedal when the shift lever is in the N (Neutral) position.
- A message "Press Clutch Pedal for Auto Start" will appear on the LCD display.
- The engine will start and the green AUTO STOP ((A)) indicator on the instrument cluster will go out.

#### DCT type

- Release the brake pedal.
- When AUTO HOLD is operating, if you release the brake pedal, the engine keeps the stop state. But if you press the accelerator pedal, the engine will start again.

The engine will also restart automatically without the driver's any actions if the following occurs:

- The fan speed of manual climate control system is set above the 3rd position when the air conditioning is on.
- The fan speed of automatic climate control system is set above the 6th position when the air conditioning is on.
- When a certain amount of time has passed with the climate control system on.
- When the defroster is on.
- The brake vaccum pressure is low.
- The battery charging status is low.
- The vehicle speed exceeds 5km/h (3 mph). M/T
- The vehicle speed exceeds 2km/h (1.2 mph). DCT type
- You shift the gear to P (park) position or you press the EPB switch in the AUTO HOLD state - DCT type
- The door is open while the seat belt is released in the AUTO HOLD state. - DCT type



The green AUTO STOP  $((\widehat{A}))$  indicator on the instrument cluster will blink for 5 seconds and a message "Auto Start" will appear on the LCD display.

## Condition of ISG system operation

# The ISG system will operate under the following condition:

- The driver's seat belt is fastened.
- The driver's door and engine hood are closed.
- The brake vaccum pressure is adequate.
- The battery is sufficiently charged.
- The outside temperature is between -2°C to 35°C (28.4°F to 95°F).
- The engine coolant temperature is not too low.
- The slope way is gentle. (DCT type)





# \* NOTICE

- If the ISG system does not meet the operation condition, the ISG system is deactivated. The light on the ISG OFF button will illuminate and a message "Auto Stop Conditions not met" will appear on the LCD display.
- If the light or notice comes on continuously, please check the operation condition.



OVF055123L

## ISG system deactivation

- If you wish to deactivate the ISG system, press the ISG OFF button. The light on the ISG OFF button will illuminate and a message "Auto Stop System Off" will appear on the LCD display.
- If you press the ISG OFF button again, the system will be activated and the light on the ISG OFF button will turn off.

# **ISG** system malfunction

*The system may not operate when:* The ISG related sensors or system error occurs.

The following will happen:

• The yellow AUTO STOP ((A)) indicator on the instrument cluster will stay on after blinking for 5 seconds.



The light on the ISG OFF button will illuminate.

## **\*** NOTICE

- If the ISG OFF button light is not turned off by pressing the ISG OFF button again or if the ISG system continuously does not work correctly, we recommend that you contact an authorized HYUNDAI dealer as soon as possible.
- When the ISG OFF button light comes on, it may stop illuminating after driving your vehicle at approximately 80 km/h for a maximum of two hours and setting the fan speed control below the 2nd position. If the ISG OFF button light continues to illuminate in spite of the procedure, we recommend that you contact an authorized HYUNDAI dealer as soon as possible.

# ! CAUTION

The ISG may not operate in the following situations.

- When a component of the ISG system is broken
- When the battery cannot be fully charged

(ex: Using a after market supply such as a black box)

- When the brake pressure is low

We recommend that you visit a HYUNDAI dealer and have your vehicle checked.

## A WARNING

When the engine is in Idle Stop mode, it's possible to restart the engine without the driver taking any action.

Before leaving the car or doing anything in the engine room area, stop the engine by turning the ignition switch to the LOCK/OFF position or removing the ignition key.

# MANUAL TRANSAXLE (IF EQUIPPED)



- Manual transaxle operation
- The manual transaxle has 6 forward gears.

This shift pattern is imprinted on the shift knob. The transaxle is fully synchronized in all forward gears so shifting to either a higher or a lower gear is easily accomplished.

- Depress the clutch pedal down fully while shifting, then release it slowly. If your vehicle is equipped with an ignition lock switch, the engine will not start when starting the engine without depressing the clutch pedal.
- The shift lever must return to the neutral position before shifting into R (Reverse). The button located immediately below the shift knob must be pushed upward while moving the shift lever to the R (Reverse) position.
- Make sure the vehicle is completely stopped before shifting into R (Reverse).

Never operate the engine with the tachometer (rpm) in the red zone.

## ! CAUTION

- When downshifting from 5 (Fifth) gear to 4 (Fourth) gear, caution should be taken not to inadvertently move the shift lever sideways in such a manner that second gear is engaged. Such a drastic downshift may cause the engine speed to increase to the point that the tachometer will enter the red-zone. Such overrevving of the engine may possibly cause engine and transaxle damage.
- Do not downshift more than 2 gears or downshift the gear when the engine is running at high speed (5,000 RPM or higher). Such a downshifting may damage the engine, clutch and the transaxle.

5 20

- During cold weather, shifting may be difficult until the transaxle lubricant has warmed up. This is normal and not harmful to the transaxle.
- If you've come to a complete stop and it's hard to shift into 1 (First) or R (Reverse), put the shift lever in neutral position and release the clutch. Press the clutch pedal back down, and then shift into 1 (First) or R (Reverse) gear position.

## ! CAUTION

- To avoid premature clutch wear and damage, do not drive with your foot resting on the clutch pedal. Also, don't use the clutch to hold the vehicle stopped on an uphill grade, while waiting for a traffic light, etc.
- Do not use the shift lever as a handrest during driving, as this can result in premature wear of the transaxle shift forks.
- To prevent possible damage to the clutch system,do not start with the 2nd (second) gear engaged except when you start on a slippery road.

# **A** WARNING

- Before leaving the driver's seat, always set the parking brake fully and shut the engine off. Then make sure the transaxle is shifted into 1 (First) gear when the vehicle is parked on a level or uphill grade, and shifted into R (Reverse) on a downhill grade. Unexpected and sudden vehicle movement can occur if these precautions are not followed in the order identified.
- If your vehicle has a manual transaxle not equipped with a ignition lock switch, it may move and cause a serious accident when starting the engine without depressing the clutch pedal while the parking brake is released and the shift lever not in the neutral position.
- Do not use the engine brake (shifting from a high gear to lower gear) rapidly on slippery roads. The vehicle may slip causing an accident.

#### Using the clutch

The clutch pedal should be depressed all the way to the floor before shifting, then released slowly. The clutch pedal should always be fully released while driving. Do not rest your foot on the clutch pedal while driving. This can cause unnecessary wear. Do not partially engage the clutch to hold the vehicle on an incline. This causes unnecessary wear. Use the foot brake or parking brake to hold the vehicle on an incline. Do not operate the clutch pedal rapidly and repeatedly.

## ! CAUTION

When operating the clutch pedal, depress the clutch pedal down fully. If you don't depress the clutch pedal fully, the clutch may be damaged or noise may occur.

#### Downshifting

When you must slow down in heavy traffic or while driving up steep hills, downshift before the engine starts to labor. Downshifting reduces the chance of stalling and gives better acceleration when you again need to increase your speed. When the vehicle is traveling down steep hills, downshifting helps maintain safe speed and prolongs brake life.

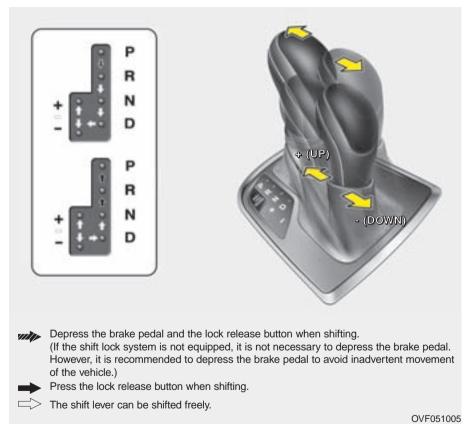
## Good driving practices

- Never take the vehicle out of gear and coast down a hill. This is extremely hazardous. Always leave the vehicle in gear.
- Don't "ride" the brakes. This can cause them to overheat and malfunction. Instead, when you are driving down a long hill, slow down and shift to a lower gear. When you do this, engine braking will help slow down the vehicle.
- Slow down before shifting to a lower gear. This will help avoid over-revving the engine, which can cause damage.
- Slow down when you encounter cross winds. This gives you much better control of your vehicle.
- Be sure the vehicle is completely stopped before you attempt to shift into R (Reverse). The transaxle can be damaged if you do not. To shift into R (Reverse), depress the clutch, move the shift lever to neutral, wait three seconds, then shift to the R (Reverse) position.
- Exercise extreme caution when driving on a slippery surface. Be especially careful when braking, accelerating or shifting gears. On a slippery surface, an abrupt change in vehicle speed can cause the drive wheels to lose traction and the vehicle to go out of control.

# **A** WARNING

- Always buckle-up! In a collision, an unbelted occupant is significantly more likely to be seriously injured or killed than a properly belted occupant.
- Avoid high speeds when cornering or turning.
- Do not make quick steering wheel movements, such as sharp lane changes or fast, sharp turns.
- The risk of rollover is greatly increased if you lose control of your vehicle at highway speeds.
- Loss of control often occurs if two or more wheels drop off the roadway and the driver oversteers to reenter the roadway.
- In the event your vehicle leaves the roadway, do not steer sharply. Instead, slow down before pulling back into the travel lanes.
- Never exceed posted speed limits.

## DUAL CLUTCH TRANSMISSION (DCT) (IF EQUIPPED)



#### Dual clutch transmission operation

The dual clutch transmission has seven forward speeds and one reverse speed. The individual speeds are selected automatically in the D (Drive) position.

# A WARNING

To reduce the risk of serious injury or death:

- ALWAYS check the surrounding areas near your vehicle for people, especially children, before shifting a vehicle into D (Drive) or R (Reverse).
- Before leaving the driver's seat, always make sure the shift lever is in the P (Park) position, then set the parking brake, and place the ignition switch in the LOCK/OFF position. Unexpected and sudden vehicle movement can occur if these precautions are not followed.
- Do not use engine braking (shifting from a high gear to lower gear) rapidly on slippery roads. The vehicle may slip causing an accident.

- The Dual Clutch Transmission gives the driving feel of a manual transmission, yet provides the ease of a fully automatic transmission. Unlike a traditional automatic transmission, the gear shifting can be felt (and heard) on the dual clutch transmission
  - Think of it as an automatically shifting manual transmission.
  - Shift into Drive range and get fully automatic shifting, similar to a conventional automatic transmission.
- Dual clutch transmission adopts drytype dual clutch, which is different from torque converter of automatic transmission, and shows better acceleration performance during driving. But, initial launch might be little bit slower than Automatic Transmission.
- The dry-type clutch transfers torque and provides a direct driving feeling which may feel different from a conventional automatic transmission with a torque converter. This may be more noticeable when starting from a stop or low vehicle speed.
- When rapidly accelerating at low vehicle speed, engine could rev at high rpm depending on vehicle drive condition.

- For smooth launch uphill, press down the accelerator pedal smoothly depending on the current conditions.
- If you release your foot from the accelerator pedal at low vehicle speed, you may feel strong engine brake, which is similar to manual transmission.
- When driving downhill, you may use Sports Mode and press the paddle shifters to downshift to a lower gear in order to control your speed without using the brake pedal excessively.
- When you turn the engine on and off, you may hear clicking sounds as the system goes through a self test. This is a normal sound for the Dual Clutch Transmission.

# ! CAUTION



• To hold the vehicle on a hill use the foot brake or the parking brake. If the vehicle is held by applying the accelerator pedal on a hill the clutch and transmission will be overheated resulting in damage.

At this time, a warning message will appear on the LCD display and you may feel a vibration. (Continued)

#### (Continued)

- If the clutch becomes overheated by excessive use of the clutch to hold on a hill, you may notice a shudder feeling and a blinking display on the instrument cluster. When this occurs, the clutch is disabled until the clutch cools to normal temperatures. If this occurs, pull over to a safe location, shift into P (Park) and apply the foot brake with engine on for a certain time on the LCD warning until it disappears.
- If the LCD warning is active, the foot brake must be applied.
- Ignoring the warnings can lead to damage to the transmission.
- If the display continues to blink, for your safety, we recommend that you contact an authorized HYUNDAI dealer.

(Continued)



• Under certain conditions such as repeated launch on steep grades, the clutch in the transmission could overheat. When the clutch is overheated, the safe protection mode engages. If the safe protection mode engages, the gear position indicator on the cluster blinks with a chime sound.

(Continued)

#### (Continued)

At this time, a warning message will appear on the LCD display and driving may not be smooth. If you ignore this warning, the driving condition may become worse. To return the normal driving condition, stop the vehicle and apply the foot brake for a few minutes before driving off.

- Gear shifts may be more noticeable than a conventional automatic transmission. This is a normal characteristic of this type of dual clutch transmission.
- During the first 1,500 km (1,000 miles), you may feel that the vehicle may not be smooth when accelerating at low speed. During this break-in period, the shift quality and performance of your new vehicle is continuously optimized.
- Always come to a complete stop before shifting into D (Drive) or R (Reverse).
- Do not put the shift lever in N (Neutral) while driving.

The indicator in the instrument cluster displays the shift lever position when the ignition switch is in the ON position.

#### P (Park)

Always come to a complete stop before shifting into P (Park).

To shift from P (Park), you must depress firmly on the brake pedal and make sure your foot is off the accelerator pedal.

The shift lever must be in P (Park) before turning the engine off.

# A WARNING

- Shifting into P (Park) while the vehicle is in motion may cause you to lose control of the vehicle.
- After the vehicle has stopped, always make sure the shift lever is in P (Park), apply the parking brake, and turn the engine off.
- Do not use the P (Park) position in place of the parking brake.

#### R (Reverse)

Use this position to drive the vehicle backward.

## .! CAUTION

Always come to a complete stop before shifting into or out of R (Reverse); you may damage the transmission if you shift into R (Reverse) while the vehicle is in motion.

#### N (Neutral)

The wheels and transmission are not engaged.

Use N (Neutral) if you need to restart a stalled engine, or if it is necessary to stop with the engine ON. Shift into P (Park) if you need to leave your vehicle for any reason.

Always depress the brake pedal when you are shifting from N (Neutral) to another gear.

## A WARNING

Do not shift into gear unless your foot is firmly on the brake pedal. Shifting into gear when the engine is running at high speed can cause the vehicle to move very rapidly. You could lose control of the vehicle and hit people or objects.

# A WARNING

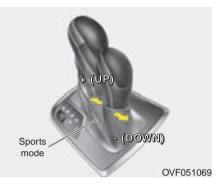
Do not drive with the shift lever in N (Neutral).

The engine brake will not work and lead to an accident.

#### D (Drive)

This is the normal driving position. The transmission will automatically shift through a seven-gear sequence, providing the best fuel economy and power.

For extra power when passing another vehicle or driving uphill depress the accelerator pedal further until you feel the transmission downshift to a lower gear.



#### Sports mode

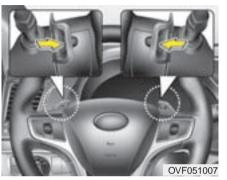
Whether the vehicle is stationary or in motion, sports mode is selected by pushing the shift lever from the D (Drive) position into the manual gate. To return to D (Drive) range operation, push the shift lever back into the main gate.

In Sports Mode, moving the shift lever backwards and forwards will allow you to select the desired range of gears for the current driving conditions.

- + (Up) : Push the lever forward once to shift up one gear.
- (Down) : Pull the lever backwards once to shift down one gear.

## **\* NOTICE**

- Only the seven forward gears can be selected. To reverse or park the vehicle, move the shift lever to the R (Reverse) or P (Park) position as required.
- Downshifts are made automatically when the vehicle slows down. When the vehicle stops, 1st gear is automatically selected.
- When the engine rpm approaches the red zone the transmission will upshift automatically.
- If the driver presses the lever to + (Up) or - (Down) position, the transmission may not make the requested gear change if the next gear is outside of the allowable engine rpm range. The driver must execute upshifts in accordance with road conditions, taking care to keep the engine rpms below the red zone.



*Paddle shifter (if equipped)* The paddle shifter is available when the shift lever is in the D (Drive) position or the sports mode.

#### With the shift lever in the D position

The paddle shifter will operate when the vehicle speed is more than 10km/h.

Pull the [+] or [-] paddle shifter once to shift up or down one gear and the system changes from automatic mode to manual mode.

When the vehicle speed is lower than 10km/h, if you depress the accelerator pedal for more than 5 seconds or if you shift the shift lever from D (Drive) to sports mode and shift it from sports mode to D (Drive) again, the system changes from manual mode to automatic mode.

#### With the shift lever in the sports mode

Pull the [+] or [-] paddle shifter once to shift up or down one gear.

## **\* NOTICE**

If you pull the [+] and [-] paddle shifters at the same time, you cannot shift the gear.

## Shift lock system (if equipped)

For your safety, the Dual clutch transmission has a shift lock system which prevents shifting the transaxle from P (Park) or N (Neutral) into R (Reverse) unless the brake pedal is depressed.

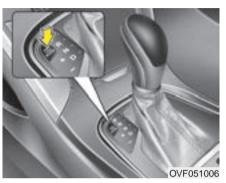
To shift the transaxle from P (Park) or N (Neutral) into R (Reverse):

- 1. Depress and hold the brake pedal.
- 2. Start the engine or turn the ignition switch to the ON position.
- 3. Move the shift lever.

If the brake pedal is repeatedly depressed and released with the shift lever in the P (Park) position, a chattering noise near the shift lever may be heard. This is a normal condition.

# A WARNING

Always fully depress the brake pedal before and while shifting out of the P (Park) position into another position to avoid inadvertent motion of the vehicle which could injure persons in or around the car.



### Shift-lock override

If the shift lever cannot be moved from the P (Park) or N (Neutral) position into R (Reverse) position with the brake pedal depressed, continue depressing the brake, then do the following:

Type A

- 1. Press the shift-lock release button.
- 2. Move the shift lever.
- 3. We recommend that the system be inspected by an authorized HYUNDAI dealer.

## Туре В

- 1. Carefully remove the cap covering the shift-lock override access hole.
- 2. Insert a screwdriver into the access hole and press down on the screwdriver.
- 3. Move the shift lever.
- 4. We recommend that the system be inspected by an authorized HYUNDAI dealer.

# Ignition key interlock system (if equipped)

The ignition key cannot be removed unless the shift lever is in the P (Park) position.

## **Good driving practices**

- Never move the shift lever from P (Park) or N (Neutral) to any other position with the accelerator pedal depressed.
- Never move the shift lever into P (Park) when the vehicle is in motion.
- Be sure the car is completely stopped before you attempt to shift into R (Reverse) or D (Drive).
- Never take the car out of gear and coast down a hill. This may be extremely hazardous. Always leave the car in gear when moving.
- Do not "ride" the brakes. This can cause them to overheat and malfunction. Instead, when you are driving down a long hill, slow down and shift to a lower gear. When you do this, engine braking will help slow the car.
- Slow down before shifting to a lower gear. Otherwise, the lower gear may not be engaged.

- Always use the parking brake. Do not depend on placing the transaxle in P (Park) to keep the car from moving.
- Exercise extreme caution when driving on a slippery surface. Be especially careful when braking, accelerating or shifting gears. On a slippery surface, an abrupt change in vehicle speed can cause the drive wheels to lose traction and the vehicle to go out of control.
- Optimum vehicle performance and economy is obtained by smoothly depressing and releasing the accelerator pedal.

# **A** WARNING

- Always buckle-up! In a collision, an unbelted occupant is significantly more likely to be seriously injured or killed than a properly belted occupant.
- Avoid high speeds when cornering or turning.
- Do not make quick steering wheel movements, such as sharp lane changes or fast, sharp turns.
- The risk of rollover is greatly increased if you lose control of your vehicle at highway speeds.
- Loss of control often occurs if two or more wheels drop off the roadway and the driver oversteers to reenter the roadway.
- In the event your vehicle leaves the roadway, do not steer sharply. Instead, slow down before pulling back into the travel lanes.
- Never exceed posted speed limits.

# A WARNING

If your vehicle becomes stuck in snow, mud, sand, etc., then you may attempt to rock the vehicle free by moving it forward and backward. Do not attempt this procedure if people or objects are anywhere near the vehicle. During the rocking operation the vehicle may suddenly move forward of backward as it becomes unstuck, causing injury or damage to nearby people or objects.

#### \* NOTICE - Kickdown Mechanism (if equipped)

Use the kickdown mechanism for maximum acceleration. Depress the accelerator pedal beyond the pressure point. The automatic transaxle will shift to a lower gear depending on the engine speed.

#### Moving up a steep grade from a standing start

To move up a steep grade from a standing start, depress the brake pedal, shift the shift lever to D (Drive). Select the appropriate gear depending on load weight and steepness of the grade, and release the parking brake. Depress the accelerator gradually while releasing the service brakes.

# DRIVE MODE INTEGRATED CONTROL SYSTEM (IF EQUIPPED)



## **DRIVE mode**

The drive mode may be selected according to the driver's preference or road condition. The system initializes to the normal mode after the engine start/stop button has been turned off and on.

When the Active ECO is activated, and the engine start/stop button is turned off and on it will change to ECO mode.

It is displayed on the AVN monitor which mode the vehicle is in as below.

- NORMAL
- ECO
- SPORT

The mode changes whenever the DRIVE MODE button is pressed.

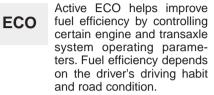
• M/T Type



• DCT Type



When normal mode is selected, it is not displayed on the cluster. ECO mode (Active ECO)



- When the DRIVE MODE button is pressed and the ECO mode is selected, the ECO indicator (green) will illuminate to show that the Active ECO is operating.
- When the Active ECO is activated, and the engine start/stop button is turned off and on it will change to ECO mode.

#### When Active FCO is activated:

- The acceleration may slightly be reduced eventhough you depress the accelerator fully.
- The air conditioner performance may be limited
- The engine noise may get louder.

The above situations are normal conditions when the active eco system is activated to improve fuel efficiency.

#### Limitation of Active ECO operation:

If the following conditions occur while Active ECO is operating, the system operation is limited even though there is no change in the ECO indicator.

- When the coolant temperature is low: The system will be limited until engine performance becomes normal.
- When driving up a hill:

The system will be limited to gain power when driving uphill because the engine torque is restricted.

- · When using manual mode: The system will be limited according to the shift location
- When the accelerator pedal is deeply depressed for a few seconds:

The system will be limited, judging that the driver wants to speed up.

#### SPORT mode

SPORT

SPORT mode focuses on dynamic driving by automatically adjusting the steering wheel, engine and transaxle system.

- When the DRIVE MODE button is pressed and the SPORT mode is selected. the SPORT indicator (yellow) will illuminate.
- When the SPORT mode is activated, and the engine start/stop button is turned off and on it will change to NORMAL mode. To turn on the SPORT mode press DRIVE MODE button again.
- If the system is activated:
- After speeding, it maintains the gear and RPM for some time even though the accelerator pedal is not depressed.
- Up-shifting is delayed.

## **\* NOTICE**

In Sport drive mode, the fuel efficiency may decrease.

# ELECTRONIC CONTROL SUSPENSION (ECS) (IF EQUIPPED)

The Electronic Control Suspension (ECS) controls the vehicle suspension automatically to maximize driving comfort by taking into account the driving conditions such as speed, surface of the road, cornering, stopping requirements and acceleration.

You can also control the vehicle suspension manually as the SPORT mode or NORMAL mode.

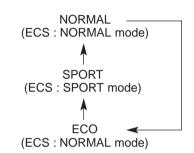
Push the DRIVE MODE button to select the SPORT mode or NORMAL mode.

Refer to the "Drive mode integrated control system" in this section.

SPORT mode provides a tighter suspension and firmer ride.

NORMAL mode provides a softer ride.

The mode changes whenever the DRIVE MODE button is pressed.



When the DRIVE mode changes, the ECS mode changes simultaneously. (Vehicles equipped with ECS)



# ECS (Electronic Control Suspension) malfunction indicator

If the ECS warning message comes on, you may have a problem with the ECS system. We recommend that the system be checked by an authorized HYUNDAI dealer.

## **BRAKE SYSTEM**

#### **Power brakes**

Your vehicle has power-assisted brakes that adjust automatically through normal usage.

In the event that the power-assisted brakes lose power because of a stalled engine or some other reason, you can still stop your vehicle by applying greater force to the brake pedal than you normally would. The stopping distance, however, will be longer.

When the engine is not running, the reserve brake power is partially depleted each time the brake pedal is applied. Do not pump the brake pedal when the power assist has been interrupted.

Pump the brake pedal only when necessary to maintain steering control on slippery surfaces.

## A WARNING - Brakes

- Do not drive with your foot resting on the brake pedal. This will create abnormal high brake temperatures, excessive brake lining and pad wear, and increased stopping distances.
- When descending a long or steep hill, shift to a lower gear and avoid continuous application of the brakes. Continuous brake application will cause the brakes to overheat and could result in a temporary loss of braking performance.
- Wet brakes may impair the vehicle's ability to sefely slow down; the vehicle may also pull to one side when the brakes are applied. Applying the brakes lightly will indicate whether they have been affected in this way. Always test your brakes in this fashion after driving through deep water. To dry the brakes, apply them lightly while maintaining a safe forward speed until brake performance returns to normal.

(Continued)

## (Continued)

• Always, confirm the position of the brake and accelerator pedal before driving. If you don't check the position of the accelerator and brake pedal before driving, you may depress the accelerator instead of the brake pedal. It may cause a serious accident.

#### In the event of brake failure

If service brakes fail to operate while the vehicle is in motion, you can make an emergency stop with the parking brake. The stopping distance, however, will be much greater than normal.

Applying the parking brake Applying the parking brake while the vehicle is moving at normal speeds can cause a sudden loss of control of the vehicle. If you must use the parking brake to stop the vehicle, use great caution in applying the brake.

#### Disc brakes wear indicator

When your brake pads are worn and new pads are required, you will hear a highpitched warning sound from your front brakes or rear brakes. You may hear this sound come and go or it may occur whenever you depress the brake pedal. Please remember that some driving conditions or climates may cause a brake squeal when you first apply (or lightly apply) the brakes. This is normal and does not indicate a problem with your brakes.

## .! CAUTION

- To avoid costly brake repairs, do not continue to drive with worn brake pads.
- Always replace the front or rear brake pads as pairs.

## A WARNING - Brake wear

This brake wear warning sound means your vehicle needs service. If you ignore this audible warning, you will eventually lose braking performance, which could lead to a serious accident.



Electronic parking brake (EPB)

Applying the parking brake To apply the EPB (electronic parking brake):

1. Depress the brake pedal.

2. Pull up the EPB switch.

Make sure the warning light comes on.

Also, the EPB is applied automatically if the Auto Hold button is on when the engine is turned off. However, if you keep pressing the EPB switch till the engine is turned off, the EPB will not be applied.

## \* NOTICE

On a steep incline or when pulling a trailer if the vehicle does not stand still, do as follows:

1. Apply the EPB.

2. Pull up the EPB switch for more than 3 seconds.

# ! CAUTION

Do not operate the parking brake while the vehicle is moving except in an emergency situation. It could damage the vehicle system and endanger driving safety.



Releasing the parking brake To release the EPB (electronic parking brake), press the EPB switch in the following condition:

- Have the ignition switch or engine start/stop button in the ON position.
- Depress the brake pedal.

Make sure the brake warning light goes off.

# To release EPB (electronic parking brake) automatically:

- Shift lever in P (Park) With the engine running depress the brake pedal and shift out of P (Park) to R (Rear) or D (Drive).
- Shift lever in N (Neutral) With the engine running depress the brake pedal and shift out of N (Neutral) to R (Rear) or D (Drive).
- Manual transaxle vehicle
  - 1. Start the engine.
  - 2. Fasten the driver's seat belt.
  - Close the driver's door, engine hood and tailgate/trunk.
  - 4. Depress the clutch pedal with the gear engaged.
  - 5. Depress the accelerator pedal while releasing the clutch pedal.

Make sure the brake warning light goes off.

## **\* NOTICE**

- For your safety, you can engage the EPB even though the ignition switch or engine stop/start button is in the OFF position, but you cannot release it.
- For your safety, depress the brake pedal and release the parking brake manually with the EPB switch when you drive downhill or when backing up the vehicle.

## \* NOTICE - Manual transaxle

A vehicle towing a trailer on a hill or on an incline may slightly roll backwards when starting the vehicle. To prevent the situation follow the below instructions.

- 1. Depress the clutch pedal and select a gear.
- 2. Keep pulling up the EPB switch.
- **3.** Depress the accelerator pedal and slowly release the clutch pedal.
- 4. If the vehicle starts off with enough driving power release the EPB switch.

Do not follow the above procedure when driving on a flat level ground. The vehicle may suddenly move forward.

# ! CAUTION

- If the parking brake warning light is still on even though the EPB has been released, we recommend that the system be checked by an authorized HYUNDAI dealer.
- Do not drive your vehicle with the EPB applied. It may cause excessive brake pad and brake rotor wear.

EPB (electronic parking brake) may be automatically applied when:

- The EPB is overheated
- · Requested by other systems

## **\* NOTICE**

If the driver turns the engine off by mistake while Auto Hold is operating, EPB will be automatically applied. (Vehicles equipped with Auto Hold)



- If you try to drive off depressing the accelerator pedal with the EPB applied, but doesn't release automatically, a warning will sound and a message will appear.
- If the driver's seat belt is not fastened and the engine hood or tailgate/trunk is opened, a warning will sound and a message will appear.
- If there is a problem with the vehicle, a warning may sound and a message may appear.

If the above situation occurs, depress the brake pedal and release EPB by pressing the EPB switch.

# A WARNING

- To prevent unintentional movement when stopped and leaving the vehicle, do not use the shift lever in place of the parking brake. Set the parking brake and make sure the shift lever is securely positioned in P (Park).
- Never allow anyone who is unfamiliar with the vehicle to touch the parking brake. If the parking brake is released unintentionally, serious injury may occur.
- All vehicles should always have the parking brake fully engaged when parking to avoid inadvertent movement of the car which can injure occupants or pedestrians.

# ! CAUTION

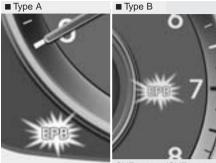
- A click sound may be heard while operating or releasing the EPB, but these conditions are normal and indicate that the EPB is functioning properly.
- When leaving your keys with a parking lot attendant or valet, make sure to inform him/her how to operate the EPB.
- The EPB may malfunction if you drive with the EPB applied.
- When you automatically release EPB by depressing the accelerator pedal, depress it slowly.



When the conversion from Auto Hold to EPB is not working properly a warning will sound and a message will appear.

# ! CAUTION

Depress the brake pedal when the above message appears for the Auto Hold and EPB may not activate. If the EPB is applied while Auto Hold is activated because of ESC (Electronic Stability Control) signal, a warning will sound and a message will appear.



#### OVF051047/OVF051067

# EPB malfunction indicator (if equipped)

This warning light illuminates if the engine start/stop button is changed to the ON position and goes off in approximately 3 seconds if the system is operation normally.

If the EPB malfunction indicator remains on, comes on while driving, or does not come on when the ignition switch or the engine start/stop button is changed to the ON position, this indicates that the EPB may have malfunctioned.

If this occurs, we recommend that the system be checked by an authorized HYUNDAI dealer.

The EPB malfunction indicator may illuminate when the ESC indicator comes on to indicate that the ESC is not working properly, but it does not indicate a malfunction of the EPB.

## ! CAUTION

- The EPB warning light may illuminate if the EPB switch operates abnormally. Shut the engine off and turn it on again after a few minutes. The warning light will go off and the EPB switch will operate normally. However, if the EPB warning light is still on, we recommend that the system be checked by an authorized HYUNDAI dealer.
- If the parking brake warning light does not illuminate or blinks even though the EPB switch was pulled up, the EPB is not applied.
- If the parking brake warning light blinks when the EPB warning light is on, press the switch, then pull it up. Once more press it back to its original position and pull it back up. If the EPB warning does not go off, we recommend that the system be checked by an authorized HYUNDAI dealer.

## **Emergency braking**

If there is a problem with the brake pedal while driving, emergency braking is possible by pulling up and holding the EPB switch. Braking is possible only while you are holding the EPB switch.

# 

Do not operate the parking brake while the vehicle is moving except in an emergency situation.

## \* NOTICE

During emergency braking by the EPB, the parking brake warning light will illuminate to indicate that the system is operating.

## ! CAUTION

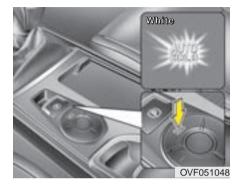
If you continuously notice a noise or burning smell when the EPB is used for emergency braking, we recommend that the system be checked by an authorized HYUNDAI dealer.

# When the EPB (electronic parking brake) does not release

If the EPB does not release normally, we recommend that you contact an authorized HYUNDAI dealer by loading the vehicle on a flatbed tow truck and have the system checked.

## AUTO HOLD (if equipped)

The Auto Hold maintains the vehicle in a standstill even though the brake pedal is not depressed after the driver brings the vehicle to a complete stop by depressing the brake pedal.



Set up

1. With the driver's door, engine hood and tailgate/trunk closed, fasten the driver's seat belt or depress the brake pedal and then press the Auto Hold button. The white AUTO HOLD indicator will come on and the system will be in the standby position.



- 2. When you stop the vehicle completely by depressing the brake pedal, the AUTO HOLD indicator changes from white to green.
- 3. The vehicle will remain stationary even if you release the brake pedal.
- 4. If EPB is applied, Auto Hold will be released.

#### Leaving

If you press the accelerator pedal with the shift lever in R (Reverse), D (Drive) or sports mode, the Auto Hold will be released automatically and the vehicle will start to move. The indicator changes from green to white.

## A WARNING

When driving off from Auto Hold by depressing the accelerator pedal, always check the surrounding area near your vehicle.

Slowly depress the accelerator pedal for a smooth launch.



#### Cancel

To cancel the Auto Hold operation, press the Auto Hold switch. The AUTO HOLD indicator will go out.

To cancel the Auto Hold operation when the vehicle is at a standstill, press the Auto Hold switch while depressing the brake pedal.

## **\* NOTICE**

- The Auto Hold does not operate when:
  - The driver's seat belt is unfastened and driver's door is opened
  - The engine hood is opened
  - The tailgate/trunk is opened
  - The shift lever is in P (Park)
    The EPB is applied
- For your safety, the Auto Hold automatically switches to EPB in such cases:
  - The driver's seat belt is unfastened and driver's door is opened
  - The engine hood is opened
  - The tailgate/trunk is opened
  - The vehicle is in a standstill for more than 10 minutes
  - The vehicle is standing on a steep slope
  - The vehicle moved several times

In these cases, the brake warning light comes on, the AUTO HOLD indicator changes from green to white, and a warning sounds and a message will appear to inform you that EPB has been automatically engaged. Before driving off again, press foot brake pedal, check the surrounding area near your vehicle and release parking brake manually with the EPB switch. (Continued) (Continued)

- If the AUTO HOLD indicator lights up yellow, the Auto Hold is not working properly. We recommend that you contact an authorized HYUNDAI dealer.
- While operating Auto Hold, you may hear mechanical noise. However, it is normal operating noise.

# A WARNING

- Press the accelerator pedal slowly when you start the vehicle.
- For your safety, cancel the Auto Hold when you drive downhill or back up the vehicle or park the vehicle.

## ! CAUTION

If there is a malfunction with the driver's door, engine hood or tailgate/ trunk open detection system, the Auto Hold may not work properly. We recommend that you contact an authorized HYUNDAI dealer.

### Anti-lock brake system (ABS)

# A WARNING

ABS (or ESC) will not prevent accidents due to improper or dangerous driving maneuvers. Even though vehicle control is improved during emergency braking, always maintain a safe distance between you and objects ahead. Vehicle speeds should always be reduced during extreme road conditions.

The braking distance for vehicle equipped with an anti-lock braking system (or Electronic Stability Control System) may be longer than for those without it in the following road conditions.

During these conditions the vehicle should be driven at reduced speeds:

- Rough, gravel or snow-covered roads.
- With tire chains installed.
- On roads where the road surface is pitted or has different surface height.

(Continued)

#### (Continued)

The safety features of an ABS (or ESC) equipped vehicle should not be tested by high speed driving or cornering. This could endanger the safety of yourself or others.

The ABS continuously senses the speed of the wheels. If the wheels are going to lock, the ABS system repeatedly modulates the hydraulic brake pressure to the wheels.

When you apply your brakes under conditions which may lock the wheels, you may hear a "tik-tik" sound from the brakes, or feel a corresponding sensation in the brake pedal. This is normal and it means your ABS is active.

In order to obtain the maximum benefit from your ABS in an emergency situation, do not attempt to modulate your brake pressure and do not try to pump your brakes. Press your brake pedal as hard as possible or as hard as the situation warrants and allow the ABS to control the force being delivered to the brakes.

## **\* NOTICE**

A click sound may be heard in the engine compartment when the vehicle begins to move after the engine is started. These conditions are normal and indicate that the anti-lock brake system is functioning properly.

- Even with the anti-lock brake system, your vehicle still requires sufficient stopping distance. Always maintain a safe distance from the vehicle in front of you.
- Always slow down when cornering. The anti-lock brake system cannot prevent accidents resulting from excessive speeds.
- On loose or uneven road surfaces, operation of the anti-lock brake system may result in a longer stopping distance than for vehicles equipped with a conventional brake system.

(ABS)

W-78

# ! CAUTION

- If the ABS warning light is on and stays on, you may have a problem with the ABS. In this case, however, your regular brakes will work normally.
- The ABS warning light will stay on for approximately 3 seconds after the ignition switch is ON. During that time, the ABS will go through self-diagnosis and the light will go off if everything is normal. If the light stays on, you may have a problem with your ABS. We recommend that you contact an authorized HYUNDAI dealer.

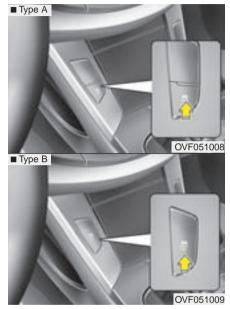
## ! CAUTION

- When you drive on a road having poor traction, such as an icy road, and operate your brakes continuously, the ABS will be active continuously and the ABS warning light may illuminate. Pull your vehicle over to a safe place and stop the engine.
- Restart the engine. If the ABS warning light is off, then your ABS system is normal. Otherwise, you may have a problem with the ABS. We recommend that you contact an authorized HYUNDAI dealer.

## **\*** NOTICE

When you jump start your vehicle because of a drained battery, the engine may not run as smoothly and the ABS warning light may turn on at the same time. This happens because of the low battery voltage. It does not mean your ABS is malfunctioning.

- Do not pump your brakes!
- Have the battery recharged before driving the vehicle.



#### Electronic stability control (ESC)

The Electronic Stability Control (ESC) system is designed to stabilize the vehicle during cornering maneuvers. ESC checks where you are steering and where the vehicle is actually going. ESC applies the brakes at individual wheels and intervenes with engine management system to stabilize the vehicle.

## 

Never drive too fast for the road conditions or too quickly when cornering. Electronic stability control (ESC) will not prevent accidents. Excessive speed in turns, abrupt maneuvers and hydroplaning on wet surfaces can still result in serious accidents. Only a safe and attentive driver can prevent accidents by avoiding maneuvers that cause the vehicle to lose traction. Even with ESC installed, always follow all the normal precautions for driving - including driving at safe speeds for the conditions. The Electronic Stability Control (ESC) system is an electronic system designed to help the driver maintain vehicle control under adverse conditions. It is not a substitute for safe driving practices. Factors including speed, road conditions and driver steering input can all affect whether ESC will be effective in preventing a loss of control. It is still your responsibility to drive and corner at reasonable speeds and to leave a sufficient margin of safety.

When you apply your brakes under conditions which may lock the wheels, you may hear a "tik-tik" sound from the brakes, or feel a corresponding sensation in the brake pedal. This is normal and it means your ESC is active.

## **\* NOTICE**

A click sound may be heard in the engine compartment when the vehicle begins to move after the engine is started. These conditions are normal and indicate that the Electronic Stability Control (ESC) System is functioning properly.

#### ESC operation ESC ON condition

- When the ignition is turned ON, ESC and ESC OFF indicator lights illuminate for approximately 3 seconds, then ESC is turned on.
  - Press the ESC OFF button for at least half a second after turning the ignition ON to turn ESC off. (ESC OFF indicator will illuminate). To turn the ESC on, press the ESC OFF button (ESC OFF indicator light will go off).
  - When starting the engine, you may hear a slight ticking sound. This is the ESC performing an automatic system self-check and does not indicate a problem.

#### When operating

22

When the ESC is in operation, ESC indicator light blinks.

- When the Electronic Stability Program is operating properly, you can feel a slight pulsation in the vehicle. This is only the effect of brake control and indicates nothing unusual.
- When moving out of the mud or slippery road, the engine rpm (revolution per minute) may not increase even if you press the accelerator pedal deeply. This is to maintain the stability and traction of the vehicle and does not indicate a problem.

#### ESC operation off ESC OFF state



This car has 2 kinds of ESC off states.

If the engine stops when ESC is off, ESC remains off. Upon restarting the engine, the ESC will automatically turn on again.



#### • ESC off state 1

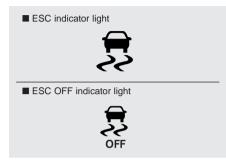
To cancel ESC operation, press the ESC OFF button (ESC OFF 🗟) shortly (ESC

OFF indicator light (ESC OFF  $\frac{1}{2}$ ) illuminates). At this state, the engine control function does not operate. It means the traction control function does not operate. Brake control function only operates.



#### • ESC off state 2

To cancel ESC operation, press the ESC OFF button (ESC OFF ) for more than 3 seconds. ESC OFF indicator light (ESC OFF ) illuminates and ESC OFF warning chime will sound. At this state, the engine control function and brake control function do not operate. It means the car stability control function does not operate any more.



### Indicator light

When ignition switch is turned to ON, the indicator light illuminates, then goes off if the ESC system is operating normally.

The ESC indicator light blinks whenever ESC is operating or illuminates when ESC fails to operate.

ESC OFF indicator light comes on when the ESC is turned off with the button.

# .! CAUTION

Driving with varying tire or wheel sizes may cause the ESC system to malfunction. When replacing tires, make sure they are the same size as your original tires.

# A WARNING

The Electronic Stability Program system is only a driving aid; use precautions for safe driving by slowing down on curved, snowy, or icy roads. Drive slowly and don't attempt to accelerate whenever the ESC indicator light is blinking, or when the road surface is slippery.

# ESC OFF usage

When driving

- ESC should be turned on for daily driving whenever possible.
- To turn ESC off while driving, press the ESC OFF button while driving on a flat road surface.

## A WARNING

Never press the ESC OFF button while ESC is operating (ESC indicator light blinks).

If ESC is turned off while ESC is operating, the vehicle may slip out of control.

## **\* NOTICE**

- When operating the vehicle on a dynamometer, ensure that the ESC is turned off (ESC OFF light illuminated). If the ESC is left on, it may prevent the vehicle speed from increasing, and result in false diagnosis.
- Turning the ESC off does not affect ABS or brake system operation.

# Vehicle stability management (VSM)

This system provides further enhancements to vehicle stability and steering responses when a vehicle is driving on a slippery road or a vehicle detected changes in coefficient of friction between right wheels and left wheels when braking.

#### VSM operation

When the VSM is operating:

- ESC (Electronic Stability Control) ( \$\$) light will blink.
- The steering wheel may be controlled. When the vehicle stability management is operating properly, you can feel a slight pulsation in the vehicle. This is only the effect of brake control and indicates nothing unusual.

#### The VSM does not operate when:

- Driving on bank road such as gradient or incline
- Driving rearward
- ESC OFF indicator light ( \$\vec{A}\$ ) remains on the instrument cluster
- EPS (Electronic Power Steering) indicator light remains on the instrument cluster

### VSM operation off

If you press the ESC OFF button to turn off the ESC, the VSM will also cancel and the ESC OFF indicator light (  $\frac{1}{20}$  ) illuminates.

To turn on the VSM, press the button again. The ESC OFF indicator light goes out.

#### Malfunction indicator

The VSM can be deactivated even if you don't cancel the VSM operation by pressing the ESC OFF button. It indicates that a malfunction has been detected somewhere in the EPS (Electronic Power Steering) system or VSM system. If the ESC indicator light ( $\clubsuit$ ) or EPS warning light remains on, we recommend that the system be checked by an authorized HYUNDAI dealer.

## \* NOTICE

- The VSM is designed to function above approximately 15 km/h (9 mph) on curves.
- The VSM is designed to function above approximately 30 km/h (18 mph) when a vehicle is braking on a split-mu road. The split-mu road is made of surfaces which have different friction forces.

# **A** WARNING

- The Vehicle Stability Management system is not a substitute for safe driving practices but a supplementary function only. It is the responsibility of the driver to always check the speed and the distance to the vehicle ahead. Always hold the steering wheel firmly while driving.
- Your vehicle is designed to activate according to the driver's intention, even with the VSM installed. Always follow all the normal precautions for driving at safe speeds for the conditions including driving in inclement weather and on a slippery road.
- Driving with varying tire or wheel sizes may cause the VSM system to malfunction. When replacing tires, make sure they are the same size as your original tires.

### Hill-start assist control (HAC)

A vehicle has the tendency to slip back on a steep hill when it starts to go after stopping. The Hill-start Assist Control (HAC) prevents the vehicle from slipping back by operating the brakes automatically for about 2 seconds. The brakes are released when the accelerator pedal is depressed or after about 2 seconds.

# A WARNING

The HAC is activated only for about 2 seconds, so when the vehicle is starting off always depress the accelerator pedal.

## **\* NOTICE**

- The HAC does not operate when the transaxle shift lever is in the P (Park) or N (Neutral) position.
- The HAC activates even though the ESC is off but it does not activate when the ESC has malfunctioned.

# Emergency Stop Signal (ESS) (if equipped)

The Emergency Stop Signal system alerts the driver behind by blinking the stop light when the vehicle is braked rapidly and severely.

The system is activated when:

- The vehicle suddenly stops (vehicle speed is over 55km/h and the vehicle deceleration at greater than 7 m/s<sup>2</sup>)
- · The ABS is activating

When the vehicle speed is under 40 km/h and the ABS deactivates or the sudden stop situation is over, the stop light blinking will stop. Instead, the hazard warning flasher will turn on automatically.

The hazard warning flasher will turn off when vehicle speed is over 10km/h after the vehicle has stopped. Also, it will turn off when the vehicle is driven at low speed for some time. You can turn it off manually by pushing the hazard warning flasher switch.

# ! CAUTION

The Emergency Stop Signal (ESS) system will not work if the hazard warning flasher is already on.

### Good braking practices

## A WARNING

- Whenever you leave or park your vehicle, always set the parking brake as far as possible and fully engage the vehicle's transaxle into the P (Park) position. If the parking brake is not fully engaged, the vehicle may move inadvertently and injure yourself and others.
- All vehicles should always have the parking brake fully engaged when parking to avoid inadvertent movement of the vehicle which can injure occupants or pedestrians.
- Check to be sure the parking brake is not engaged and that the parking brake indicator light is out before driving away.
- Driving through water may get the brakes wet. They can also get wet when the vehicle is washed. Wet brakes can be dangerous! Your vehicle will not stop as quickly if the brakes are wet. Wet brakes may cause the vehicle to pull to one side.

To dry the brakes, apply the brakes lightly until the braking action returns to normal, taking care to keep the vehicle under control at all times. If the braking action does not return to normal, stop as soon as it is safe to do so and we recommend that you call an authorized HYUNDAI dealer.

- Do not coast down hills with the vehicle out of gear. This is extremely hazardous. Keep the vehicle in gear at all times, use the brakes to slow down, then shift to a lower gear so that engine braking will help you maintain a safe speed.
- Do not "ride" the brake pedal. Resting your foot on the brake pedal while driving can be dangerous because it can result in the brakes overheating and losing their effectiveness. It also increases the wear of the brake components.
- If a tire goes flat while you are driving, apply the brakes gently and keep the vehicle pointed straight ahead while you slow down. When you are moving slowly enough for it to be safe to do so, pull off the road and stop in a safe place.
- If your vehicle is equipped with an dual clutch transmission, do not let your vehicle creep forward. To avoid creeping forward, keep your foot firmly on the brake pedal when the vehicle is stopped.

- Be cautious when parking on a hill. Firmly engage the parking brake and place the shift lever in P (dual clutch transmission) or in first or reverse gear (manual transaxle). If your vehicle is facing downhill, turn the front wheels into the curb to help keep the vehicle from rolling. If your vehicle is facing uphill, turn the front wheels away from the curb to help keep the vehicle from rolling. If there is no curb or if it is required by other conditions to keep the vehicle from rolling, block the wheels.
- Under some conditions your parking brake can freeze in the engaged position. This is most likely to happen when there is an accumulation of snow or ice around or near the rear brakes or if the brakes are wet. If there is a risk that the parking brake may freeze, apply it only temporarily while you put the shift lever in P (dual clutch transmission) or in first or reverse gear (manual transaxle) and block the rear wheels so the vehicle cannot roll. Then release the parking brake.
- Do not hold the vehicle on the upgrade with the accelerator pedal. This can cause the transaxle to overheat. Always use the brake pedal or parking brake.

# FORWARD COLLISION-AVOIDANCE ASSIST (FCA) SYSTEM (IF EQUIPPED)

The Forward Collision-Avoidance Assist (FCA) system is designed to help detect and monitor the vehicle ahead in the roadway through camera recognition to warn the driver that a collision is imminent, and if necessary, apply emergency braking.

The camera type FCA system detects the vehicle ahead in the roadway through camera.

# A WARNING

Take the following precautions when using the Forward Collision-Avoidance Assist (FCA) system:

- This system is only a supplemental system and it is not intended to, nor does it replace the need for extreme care and attention of the driver. The sensing range and objects detectable by the sensors are limited. Pay attention to the road conditions at all times.
- NEVER drive too fast in accordance with the road conditions or while cornering.
- Always drive cautiously to prevent unexpected and sudden situations from occurring. FCA does not stop the vehicle completely and is not a collision avoidance system.

# System setting and activation *System setting*

• The driver can activate the FCA by placing the ignition switch to the ON position and by selecting:

"User Settings  $\rightarrow$  Driver assistance  $\rightarrow$  Forward collision-Avoidance Assist"



The warning light illuminates on the LCD display, when you cancel the FCA system. The driver can mon-

itor the FCA ON/OFF status on the LCD display. Also, the warning light illuminates when the ESC (Electronic Stability Control) is turned off. If the warning light remains ON when the FCA is activated, we recommend that you have the system checked by an authorized HYUNDAI dealer.

 The driver can select the initial warning activation time on the LCD display.
 Go to the "User Settings → Driver assistance → Forward collision warning → Early/Normal/Later". The options for the initial Forward Collision Warning includes the following:

- Early:

When this condition is selected, the initial Forward Collision Warning is activated earlier than normal. This setting maximizes the amount of distance between the vehicle or pedestrian ahead before the initial warning occurs.

Even though, 'Early' is selected if the front vehicle suddenly stops the initial warning activation time may not seem fast.

If you feel the warning activates too early, set the Forward Collision Warning to "Normal".

- Normal:

When this condition is selected, the initial Forward Collision Warning is activated sensitively. If you feel the warning activates too early, set the Forward Collision Warning to 'Later'.

Even though, 'Normal' is selected if the front vehicle suddenly stops the initial warning activation time may not seem fast. - Later:

When this condition is selected, the initial Forward Collision Warning is activated later than normal. This setting reduces the amount of distance between the vehicle ahead before the initial warning occurs.

Select 'Later' when traffic is light and when driving speed is slow.

# if you change the warning timing, the warning timing of other systems may change.

Always be aware of warning timing before changing the warning timing.

#### Prerequisite for activation

The FCA gets ready to be activated, when the FCA is selected on the LCD display, and when the following prerequisites are satisfied.

- The ESC (Electronic Stability Control) is on.
- Vehicle speed is over 8 km/h (5 mph). (The FCA is only activated within a certain speed range.)

(However the FCA brake control is only activated when vehicle speed is below 65 km/h (40 mph).

- The system detects a vehicle in front, which may collide with your vehicle. (The FCA may not be activated or may sound a warning alarm in accordance with the driving situation or vehicle condition.)

# A WARNING

- Completely stop the vehicle on a safe location before operating the switch on the steering wheel to activate/ deactivate the FCA system.
- The FCA automatically activates upon placing the Engine Start/Stop button to the ON position. The driver can deactivate the FCA by canceling the system setting on the LCD display.
- The FCA automatically deactivates upon canceling the ESC (Electronic Stability Control). When the ESC is canceled, the FCA cannot be activated on the LCD display. The FCA warning light will illuminate which is normal.

# FCA warning message and system control

The FCA produces warning messages and warning alarms in accordance with the collision risk levels, such as abrupt stopping of the vehicle in front, insufficient braking distance detection. Also, it controls the brakes in accordance with the collision risk levels.

The driver can select the initial warning activation time in the User Settings in the LCD display. The options for the initial Forward Collision Warning include Normal or Late initial warning time.



*Collision Warning (First warning)* This warning message appears on the LCD display with a warning chime.



*Collision Warning (Second warning)* This warning message appears on the LCD display with a warning chime. Additionally, some vehicle system intervention occurs by the engine management system to help decelerate the vehicle.

- Your vehicle speed may decelerate moderately.
- The FCA system limitedly controls the brakes to preemptively mitigate impact in a collision.



OVF058151

Emergency braking (Third warning)

This warning message appears on the LCD display with a warning chime.

Additionally, some vehicle system intervention occurs by the engine management system to help decelerate the vehicle.

- The FCA system limitedly controls the brakes to preemptively mitigate impact in a collision. The brake control is maximized just before a collision.

#### Brake operation

- In an urgent situation, the braking system enters into the ready status for prompt reaction against the driver's depressing the brake pedal.
- The FCA provides additional braking power for optimum braking performance, when the driver depresses the brake pedal.
- The braking control is automatically deactivated, when the driver sharply depresses the accelerator pedal, or when the driver abruptly operates the steering wheel.
- The FCA brake control is automatically canceled, when risk factors disappear.

## ! CAUTION

- The driver should always use extreme caution while operating the vehicle, whether or not there is a warning message or alarm from the FCA system.
- The warning of the FCA System may not sound while other system's warning sounds.

# A WARNING

The braking control cannot completely stop the vehicle nor avoid all collisions. The driver should hold the responsibility to safely drive and control the vehicle.

# A WARNING

The FCA system logic operates within certain parameters, such as the distance from the vehicle ahead, the speed of the vehicle ahead, and the driver's vehicle speed. Certain conditions such as inclement weather and road conditions may affect the operation of the FCA system.

## A WARNING

Never deliberately drive dangerously to activate the system.



#### FCA sensor

In order for the FCA system to operate properly, always make sure the sensor is clean and free of dirt, snow, and debris. Dirt, snow, or foreign substances on the lens may adversely affect the sensing performance of the sensor.

# ! CAUTION

- NEVER install any accessories or stickers on the front windshield, nor tint the front windshield.
- NEVER locate any reflective objects (i.e. white paper, mirror) over the dashboard. Any light reflection may cause a malfunction of the system.
- Pay extreme caution to keep the camera out of water.
- NEVER disassemble the camera assembly, nor apply any impact on the camera assembly.
- Playing the vehicle audio system at high volume may offset the system warning sounds.
- Always keep the sensors clean.
- Be careful not to apply unnecessary force on the sensor. If the sensor is forcibly moved out of proper alignment, the system may not operate correctly. In this case, a warning message may not be displayed. We recommend that you have the vehicle inspected by an authorized HYUNDAI dealer.

## **\* NOTICE**

We recommend that you have the system checked by an authorized HYUNDAI dealer when:

• The windshield glass is replaced.



However the FCA may not properly operate in an area (e.g. open terrain), where any substances are not detected or the camera is blocked with dirt, snow or debris after turning ON the engine. Although a warning message will not appear on the LCD display, the FCA may not properly operate.



# Warning message and warning light

Forward Collision-Avoidance Assist (FCA) system disabled. Camera obscured

When the camera is blocked with dirt, snow, or debris, the FCA system operation may stop temporarily.

If this occurs, a warning message will appear on the LCD display.

Remove any dirt, snow, or debris and clean the front camera before operating the FCA system.

The system will operate normally when such dirt, snow or debris is removed.



## System malfunction

Check Forward Collision Avoidance Assist system

- When the FCA is not working properly, the FCA warning light (Sample) will illuminate and the warning message will appear for a few seconds. After the message disappears, the master warning light (A) will illuminate. In this case, we recommend that you have the vehicle inspected by an authorized HYUNDAI dealer.
- The FCA warning message may appear along with the illumination of the ESC (Electronic Stability Control) warning light.

# A WARNING

- The FCA is only a supplemental system for the driver's convenience. The driver should hold the responsibility to control the vehicle operation. Do not solely depend on the FCA system. Rather, maintain a safe braking distance, and, if necessary, depress the brake pedal to reduce the driving speed.
- In certain instances and under certain driving conditions, the FCA system may produce a warning alarm and control the brake system unnecessarily. And, the FCA system may not produce a warning alarm and control the brake system due to detecting limitation of sensor.

Also, in certain instances the front camera recognition system may not detect the vehicle ahead. The FCA system may not activate and the warning message will not be displayed.

(Continued)

#### (Continued)

- Even if there is any problem with the brake control function of the FCA system, the vehicle's basic braking performance will operate normally. However, brake control function for avoiding collision will not activate.
- If the vehicle in front stops suddenly, you may have less control of the brake system. Therefore, always keep a safe distance between your vehicle and the vehicle in front of you.
- The FCA system may activate during braking and the vehicle may stop suddenly shifting loose objects toward the passengers. Always keep loose objects secured.
- The FCA system may not activate if the driver applies the brake pedal to avoid a collision.
- The brake control may be insufficient, possibly causing a collision, if a vehicle in front abruptly stops. Always pay extreme caution.

(Continued)

#### (Continued)

- The FCA system may not activate according to the road conditions, inclement weather, driving conditions or traffic conditions.
- Occupants may get injured, if the vehicle abruptly stops by the activated FCA system. Pay extreme caution.
- The FCA system operates only to detect vehicles in front of the vehicle.

# A WARNING

- The FCA system does not operate when the vehicle is in reverse.
- The FCA system is not designed to detect other objects on the road such as animals.
- The FCA system does not detect pedestrians in front of the vehicle.
- The FCA system does not detect vehicles in the opposite lane.
- The FCA system does not detect cross traffic vehicles that are approaching.
- The FCA system cannot detect the driver approaching the side view of a parked vehicle (for example on a dead end street.)

In these cases, you must maintain a safe braking distance, and if necessary, depress the brake pedal to reduce the driving speed in order to maintain a safe distance.

#### Limitations of the system

The Forward Collision-Avoidance Assist (FCA) system is designed to monitor the vehicle ahead in the roadway through camera recognition to warn the driver that a collision is imminent, and if necessary, apply emergency braking.

In certain situations, the camera may not be able to detect the vehicle ahead. In these cases, the FCA system may not operate normally. The driver must pay careful attention in the following situations where the FCA operation may be limited.

#### **Detecting vehicles**

The sensor may be limited when:

- The camera is blocked with a foreign object or debris
- The camera lens is contaminated due to tinted, filmed or coated windshield, damaged glass, or stuck of foreign matter (sticker, bug, etc.) on the glass
- Inclement weather such as heavy rain or snow obscures the field of view of the camera
- There is interference by electromagnetic waves
- The camera recognition is limited
- The vehicle in front is too small to be detected (for example a motor cycle or bicycle etc.)
- The vehicle in front is an oversize vehicle or trailer that is too big to be detected by the camera recognition system (for example a tractor trailer, etc.)
- The camera's field of view is not well illuminated (either too dark or too much reflection or too much backlight that obscures the field of view)
- The vehicle in front does not have their rear lights or their rear lights does not turned ON or their rear lights are located unusually.

- The outside brightness changes suddenly, for example when entering or exiting a tunnel
- When light coming from a street light or an oncoming vehicle is reflected on a wet road surface such as a puddle in the road
- The field of view in front is obstructed by sun glare or head light of oncoming vehicle.
- The windshield glass is fogged up; a clear view of the road is obstructed
- The vehicle in front is driving erratically
- The vehicle is on unpaved or uneven rough surfaces, or road with sudden gradient changes.
- The vehicle is driven near areas containing metal substances as a construction zone, railroad, etc.
- The vehicle drives inside a building, such as a basement parking lot
- The camera does not recognize the entire vehicle in front.
- The camera is damaged.

5 62

• The brightness outside is too low such as when the headlamps are not on at night or the vehicle is going through a tunnel.

- The shadow is on the road by a median strip, trees, etc.
- The vehicle drives through a tollgate.
- The windshield glass is fogged up; a clear view of the road is obstructed.
- The rear part of the vehicle in front is not normally visible. (the vehicle turns in other direction or the vehicle is overturned.)
- The adverse road conditions cause excessive vehicle vibrations while driving
- The sensor recognition changes suddenly when passing over a speed bump
- The vehicle in front is moving vertically to the driving direction
- The vehicle in front is stopped vertically
- The vehicle in front is driving towards your vehicle or reversing
- You are on a roundabout and the vehicle in front circles



- Driving on a curve

The performance of the FCA system may be limited when driving on a curved road. On curved roads, the other vehicle on the same lane is not recognized and the FCA system's performance may be degraded. This may result in unnecessary alarm or braking or no alarm or braking when necessary.

Also, in certain instances the front camera recognition system may not detect the vehicle traveling on a curved road.

In these cases, the driver must maintain a safe braking distance, and if necessary, depress the brake pedal to reduce your driving speed in order to maintain a safe distance.



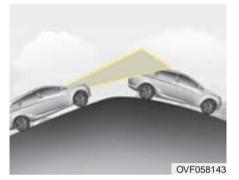
The FCA system may recognize a vehicle in the next lane when driving on a curved road.

In this case, the system may unnecessarily alarm the driver and apply the brake.

Always pay attention to road and driving conditions, while driving. If necessary, depress the brake pedal to reduce your driving speed in order to maintain a safe distance.

Also, when necessary depress the accelerator pedal to prevent the system from unnecessarily decelerating your vehicle. Check to be sure that the road conditions

permit safe operation of FCA.

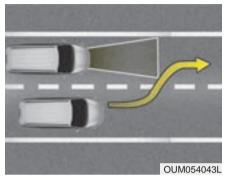


- Driving on a slope

The performance of the FCA decreases while driving upward or downward on a slope, not recognizing the vehicle in front in the same lane. It may unnecessarily produce the warning message and the warning alarm, or it may not produce the warning message and the warning alarm at all.

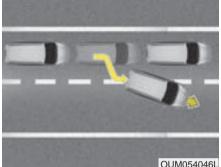
When the FCA suddenly recognizes the vehicle in front while passing over a slope, you may experience sharp deceleration.

Always keep your eyes forward while driving upward or downward on a slope, and, if necessary, depress the brake pedal to reduce your driving speed in order to maintain distance.



#### - Changing lanes

When a vehicle changes lanes in front of you, the FCA system may not immediately detect the vehicle, especially if the vehicle changes lanes abruptly. In this case, you must maintain a safe braking distance, and if necessary, depress the brake pedal to reduce your driving speed in order to maintain a safe distance.



OUM054046L

When driving in stop-and-go traffic, and a stopped vehicle in front of you merges out of the lane, the FCA system may not immediately detect the new vehicle that is now in front of you. In this case, you must maintain a safe braking distance, and if necessary, depress the brake pedal to reduce your driving speed in order to maintain a safe distance.



- Detecting the vehicle in front of you If the vehicle in front of you has cargo that extends rearward from the cab, or when the vehicle in front of you has higher ground clearance, additional special attention is required. The FCA system may not be able to detect the cargo extending from the vehicle. In these instances, you must maintain a safe braking distance from the rearmost object, and if necessary, depress the brake pedal to reduce your driving speed in order to maintain distance.

# A WARNING

- Do not use the Forward Collision avoidance Assist (FCA) system when towing a vehicle.
- Application of the FCA system while towing may adversely affect the safety of your vehicle or the towing vehicle.
- Use extreme caution when the vehicle in front of you has cargo that extends rearward from the cab, or when the vehicle in front of you has higher ground clearance.
- The FCA system is designed to detect and monitor the vehicle ahead in the roadway through camera recognition. It is not designed to detect pedestrians, bicycles, motorcycles, or smaller wheeled objects such as luggage bags, shopping carts, or strollers.
- Never try to test the operation of the FCA system. Doing so may cause severe injury or death.
- If the front glass or camera have been replaced or repaired, we recommend that you have your vehicle inspected by an authorized HYUNDAI dealer.

# **\*** NOTICE

In some instances, the FCA system may be cancelled when subjected to electromagnetic interference.

# **CRUISE CONTROL SYSTEM (IF EQUIPPED)**



- 1. Cruise indicator
- 2. Cruise set indicator

The cruise control system allows you to program the vehicle to maintain a constant speed without pressing the accelerator pedal.

This system is designed to function above approximately 40 km/h (25 mph).

# A WARNING

- If the cruise control is left on, (cruise indicator light is illuminated), the cruise control can be switched on accidentally. Keep the cruise control system off when the cruise control is not in use, to avoid inadvertently setting a speed.
- Use the cruise control system only when traveling on open highways in good weather.
- Do not use the Cruise Control when it may be unsafe to keep the vehicle at a constant speed:
  - When driving in heavy traffic or when traffic conditions make it difficult to drive at a constant speed
  - When driving on rainy, icy, or snow-covered roads
- When driving on hilly or windy roads
- When driving in windy areas
- When driving with limited view (possibly due to bad weather such as fog, snow, rain and sandstorm)
- Pay particular attention to the driving conditions whenever using the cruise control system.

#### (Continued)

#### (Continued)

• Be careful when driving downhill using the cruise control system, which may increase the vehicle speed.

# ! CAUTION

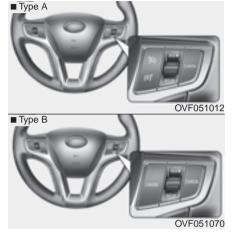
During cruise-speed driving of a manual transaxle vehicle, do not shift into neutral without depressing the clutch pedal, since the engine will be overrevved. If this happens, depress the clutch pedal or release the cruise control ON-OFF switch.

## **\* NOTICE**

During normal cruise control operation, when the SET switch is activated or reactivated after applying the brakes, the cruise control will energize after approximately 3 seconds. This delay is normal.

# **\*** NOTICE

To activate cruise control, depress the brake pedal at least once after turning the ignition switch to the ON position or starting the engine. This is to check if the brake switch which is important part to cancel cruise control is in normal condition.



## Cruise control switch

CANCEL: Cancels cruise control operation.

- ORUISE : Turns cruise control system on or off.
- RES+: Resumes or increases cruise control speed.
- SET-: Sets or decreases cruise control speed.





## To set cruise control speed:

- 1. Press the cruise O/CRUISE button on the steering wheel, to turn the system on. The cruise indicator light will illuminate.
- 2. Accelerate to the desired speed, which must be more than 40 km/h (25 mph).

## **\* NOTICE - Manual transaxle**

For manual transaxle vehicles, you should depress the brake pedal at least once to set the cruise control after starting the engine.

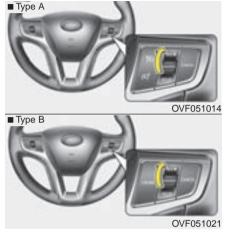




- OVF051022
- 3. Move the lever down (to SET-), and release it at the desired speed. The cruise set indicator light will illuminate. Release the accelerator pedal at the same time. The desired speed will automatically be maintained.

On a steep grade, the vehicle may slow down or speed up slightly while going downhill.

5 67



# To increase cruise control set speed:

Follow either of these procedures:

- Move the lever up (to RES+) and hold it. Your vehicle will accelerate. Release the lever at the speed you want.
- Move the lever up (to RES+) and release it immediately. The cruising speed will increase by 2.0 km/h (1.2 mph) each time you move the lever up (to RES+) in this manner.





## To decrease the cruising speed:

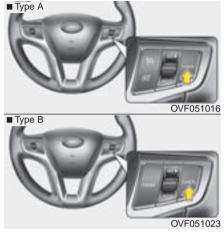
Follow either of these procedures:

- Move the lever down (to SET-) and hold it. Your vehicle will gradually slow down. Release the lever at the speed you want to maintain.
- Move the lever down (to SET-) and release it immediately. The cruising speed will decrease by 2.0 km/h (1.2 mph) each time you move the lever down (to SET-) in this manner.

# To temporarily accelerate with the cruise control on:

If you want to speed up temporarily when the cruise control is on, depress the accelerator pedal. Increased speed will not interfere with cruise control operation or change the set speed.

To return to the set speed, take your foot off the accelerator pedal.



To cancel cruise control, do one of the following:

- Depress the brake pedal.
- Depress the clutch pedal if equpped with a manual transaxle.
- Press the CANCEL switch located on the steering wheel.
- Decrease the vehicle speed lower than the memory speed by 20 km/h (12 mph).
- Decrease the vehicle speed to less than approximately 40 km/h (25 mph).

Each of these actions will cancel cruise control operation (the cruise set indicator light will go off), but it will not turn the system off. If you wish to resume cruise control operation, move up the lever (to RES+) located on your steering wheel. You will return to your previously preset speed.





To resume cruising speed at more than approximately 40 km/h (25 mph):

If any method other than the cruise /CRUISE button was used to cancel cruising speed and the system is still activated, the most recent set speed will automatically resume when you move the lever up (to RES+).

It will not resume, however, if the vehicle speed has dropped below approximately 40 km/h (25 mph).

# To turn cruise control off, do one of the following:

- Press the cruise ()/CRUISE button.
- Turn the ignition off.

Both of these actions cancel cruise control operation. If you want to resume cruise control operation, repeat the steps provided in "To set cruise control speed" on the previous page.

# SPEED LIMIT CONTROL SYSTEM (IF EQUIPPED)

You can set the speed limit when you do not want to drive over a specific speed. If you drive over the preset speed limit, the warning system operates (set speed limit will blink and chime will sound) until the vehicle speed returns within the speed limit.

### **\* NOTICE**

While speed limit control is in operation, the cruise control system cannot be activated.



# OVE051012

## Speed limit control switch

CANCEL: Cancels set speed limit.

Turns speed limit control system on or off.

RES+: Resumes or increases speed limit control speed.

SET-: Sets or decreases speed limit control speed.



## To set speed limit :

1. Press the speed limit 🕥 button on the steering wheel, to turn the system on.

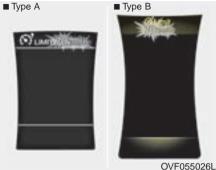


The speed limit indicator light will illuminate.



- 2. Move the lever down (to SET-).
- Move the lever up (to RES+) or down (to SET-), and release it at the desired speed. Move the lever up (to RES+) or down (to SET-) and hold it. The speed will increase or decrease by 5 km/h (3 mph).





OVF055025L

The set speed limit will be displayed.

To drive over the preset speed limit you must depress hard on the accelerator pedal (more than approximately 80%) until the kick down mechanism works with a clicking noise. Then the set speed limit will blink and chime will sound until you return the vehicle speed within the speed limit.

## **\* NOTICE**

- Depressing the accelerator pedal less than approximately 50%, the vehicle will not speed over the preset speed limit but maintain the vehicle speed within the speed limit.
- A clicking noise heard from the kick down mechanism by depressing the accelerator pedal fully is a normal condition.





Type B

#### To turn off the speed limit control, do one of the following:

- Press the speed limit 🔊 button once again.
- Press the cruise switch (If you press cruise switch, the cruise system will turn on)

If you press the CANCEL switch once, the set speed limit will cancel, but it will not turn the system off. If you wish to reset the speed limit, move the lever up (to RES+) or down (to SET-) to the desired speed.

# ! CAUTION

Type A

The "OFF" indicator will blink if there is a problem with speed limit control system.

If this occurs, we recommend that the system be checked by an authorized HYUNDAI dealer.

## INTELLIGENT SPEED LIMIT WARNING (ISLW) SYSTEM (IF EQUIPPED)



The system displays the information of speed limit and no passing restriction to the driver in both the instrument cluster and navigation screen. ISLW detects traffic signs with camera system attached behind the top of the windscreen.

The system considers the information stored in the navigation system and also displays speed limits present on routes without signs.

# A WARNING

- Intelligent Speed Limit Warning (ISLW) system is only an aid and is not always able to correctly display speed limits and overtaking restrictions.
- The driver always keeps the responsibility to not exceed the maximum allowed speed
- Do not place any accessories, stickers or tint the windshield near the rearview mirror.
- The system detects traffic signs and displays speed limit information by a camera therefore, if traffic signs are hard to detect, the system may not work properly.
   Please refer to "Driver's Attention".
- Do not remove any LDW parts or apply impact.

(Continued)

#### (Continued)

- Do not place objects on the dashboard that reflects light such as mirrors, white paper, etc. The system may malfunction if the sunlight is reflected.
- The system is not available in all countries.



#### OVF058145

#### ISLW activation / deactivation

• ISLW Setting method :

Cluster User Settings  $\rightarrow$  Driver Assistance  $\rightarrow$  Speed Limit Warning.

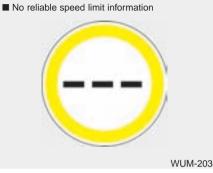
- The information of speed limit and no passing restriction will appear on the cluster using a symbol if you have activated ISLW in User Settings of cluster.
- If ISLW is activated in navigation setting, the information also displayed in navigation screen.

#### Operation

- If a traffic sign that is relevant to your vehicle is passed, the system displays the information of the speed limits and no passing restrictions to the driver.
- When the driver turn on the ignition, the system displays stored information of the speed limit before turn off the ignition.
- Sometimes different speed limits are displayed for the same road. The information displayed depending on the situation. Because, traffic signs with additional sign (e.g rainy, arrow...) are also detected and compared with vehicle interior data(e.g wiper operation, turn signal...).
- The system can update the speed limit information without visible speed limit signs in the following situations.
  - When you change your driving direction with right or left or U turning.
  - When vehicle changes roads. (e.g. from highway to country road...)
  - When you enter or exit into town or village.

## **\* NOTICE**

If speed limit value has the difference between cluster and navigation, check the speed unit setting in navigation.



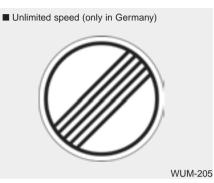
#### No passing information



WVF-60/WUM-204

## Display

- If the system doesn't have a reliable speed limit information, the following symbol is displayed in both the instrument cluster and navigation screen.
- If the system detect no passing sign, no passing is displayed in both the instrument cluster and navigation screen.



 For some areas on highways in germany there's no speed limit applicable. In that case ISLW shows "end of limitation" traffic sign as long as you don't pass another speed limit sign.





#### Warning message

The message will appear when camera's field of view is covered by some objects. The system stops until the field of view is normal.

Check the windshield around the camera view area.

If the system does not work normally even though camera's field of view is cleared, we recommend that the system be checked by an authorized HYUNDAI dealer. When ISLW is not working properly, the warning message will come on for a few second. After the message disappears, the master warning light will illuminate.

We recommend that the system be checked by an authorized HYUNDAI dealer.

The system may not fully operate and provide correct information in the following situations.

- Traffic signs are positioned on sharp curve.
- Poorly positioned traffic sign. (eg. Rotated, shaded by any object, damaged...)
- Concealed traffic signs by other vehicle.
- Broken LED traffic signs.
- · Poor weather like snow, rain, fog
- There is glare around traffic signs by low sun in the sky.
- There is insufficient illumination of the traffic signs in the night.
- There is bright lights around traffic signs.
- There is dirt, ice or frost on the windshield in the area of the camera.
- When camera field of view is covered by objects such as a sticker, paper, leaf fall.
- When driving very close to the vehicle in front of you.
- When navigation system has malfunction.
- When bus or trucks attached with a speed sticker are passing you.
- When you are in area or countries where navigation system is not covered.
- When a navigation system not updated latest map version.

### **DRIVER'S ATTENTION**

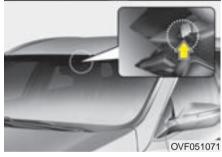
The driver must be cautious in the below situations for the system may not assist the driver and may not work properly.

- Do not stick or attach anything to the windshield in front of the camera as this may reduce effectiveness or cause one more of the systems dependent on the camera to stop working.
- Keep the windshield in the area behind the interior rear view mirror clean.
- Do not place reflective materials, such as white paper or a mirror, on the instrument panel.
- Do not strike or damage the areas around the camera unit.
- Do not touch the camera lens or remove the screw located on the camera unit.
- The system does not work in all situations but is designed merely as a supplementary aid.
- The system assists the driver and does not replace the human eye.

• The driver always bears ultimate responsibility for ensuring that the vehicle is driven safely and that applicable road traffic rules and regulations are followed.

# LANE KEEPING ASSIST (LKA) SYSTEM (IF EQUIPPED)





The Lane Keeping Assist (LKA) system detects lane markers on the road, and assists the driver's steering to help keep the vehicle between lanes. When the system detects the vehicle straying from its lane, it alerts the driver with a visual and audible warning, while applying a slight counter-steering torque, trying to prevent the vehicle from moving out of its lane.

# A WARNING

- The steering wheel is not continuously controlled so if the vehicle speed is very fast when leaving a lane the vehicle may not be controlled by the system.
- The operation of the LKA can be affected by several factors (including environmental conditions).
- It is the responsibility of the driver to pay attention to the roadway and to maintain the vehicle in its lane at all times.
- Do not steer the steering wheel suddenly when the steering wheel is being assisted by the system.
- LKA prevents the driver from moving out of the lane unintentionally by assisting the driver's steering. However, the driver should not solely rely on the system but always pay attention on the steering wheel to stay in the lane.
- Always check the road condition and surroundings and be cautious when the system cancels, does not operate or malfunctions.

(Continued)

### (Continued)

- Do not place any accessories, stickers or tint the windshield near the rearview mirror.
- The system detects lane markers and controls the steering wheel by a camera, therefore, if the lane markers are hard to detect, the system may not work properly.
   Please refer to "Driver's Attention".
- Do not remove any LKA parts or apply impact.
- Do not place objects on the dashboard that reflects light such as mirrors, white paper, etc. The system may malfunction if the sunlight is reflected.
- Loud audio sounds may interfere with the passenger from hearing warning chimes.
- Always have your hands on the steering wheel while the LKA system is activated. If you continue to drive with your hands off the steering wheel after the "Hand on" warning, the system will turn off automatically.
- If you drive very fast, the vehicle may stray out of the lane. Always be cautious when using the system.



## **LKA** operation

- To turn on the LKA, push the button with the ignition switch in the ON position.
- The LKA indicator (green) will illuminate.
- To turn off the system, press the button again. The indicator turns off.



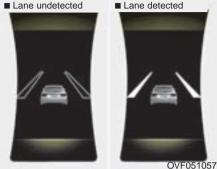
LKA activation

- The LKA screen will appear on the LCD display if the system is activated.
- · When both lanes are detected and all the conditions to activate the LKA are satisfied, the steering wheel will be controlled (green steering wheel indicator will illuminate).

# A WARNING

The The Lane Keeping Assist (LKA) system is a system to prevent the driver from leaving the lane. However, the driver should not solely rely on the system but always check the road conditions when driving.

Lane undetected

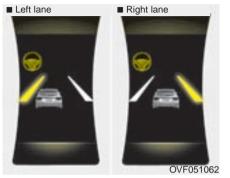


· If the system detects a lane, the color changes from black to white.

Left lane detected



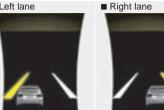




- If the system detects the left lane, the left lane color will change from black to white.
- · If the system detects the right lane, the right lane color will change from black to white.
- · Both lanes must be detected for the system to fully activate.
- · If only one of the lane is detected, the system will warn (warning beep and blinking yellow lane) the driver when the driver crosses the detected lane.

#### Warning

- If you cross a lane, the lane you cross will blink (vellow) on the LCD display with an audible warning.
- If the steering wheel appears, the system will control the vehicle's steering to prevent the vehicle from crossing the lane.



Left lane

OVF051063

· If all the conditions to activate LKA is not satisfied, the system will convert to LDW and warn the driver only when the driver crosses the lane markers



 If the driver takes one's hands off the steering wheel while the LKA is activated, the system will warn the driver after several seconds with a visual and audible warning.

# A WARNING

The warning message may appear late according to road conditions. Therefore, always have your hands on the steering wheel while driving.



 If the driver still does not have one's hand on the steering wheel after several seconds, the system will be automatically cancelled.

# **A** WARNING

- The driver is responsible for accurate steering.
- Turn off the system and drive the vehicle personally in below situations.
  - In bad weather
  - In bad road condition
  - When the steering wheel needs to be controlled by the driver frequently.

## **\* NOTICE**

- Even though the steering is assisted by the system, the driver may control the steering.
- The steering wheel may feel heavier when the steering wheel is assisted by the system than when it is not.

### The system will be cancelled when:

- Vehicle speed is below 55 km/h (34.2 mph) and over 180 km/h (111.8 mph).
- Only one lane is detected.
- Always turn on the turn signal to change lanes. If you change lanes without the turn signal on, the steering wheel might be controlled.
- The hazard warning light is on.
- The width of the lane is below 2.6 m and over 4.5 m.
- ESC (Electronic Stability Control) and VSM (Vehicle stability management) are activated.
- When the system is on or after changing a lane, drive in the middle of the lane. If not, the system will not provide the steering assist function.
- The steering will not be assisted when you drive fast on a sharp curve.
- The steering will not be assisted when you change lanes fast.
- The steering will not be assisted when you brake suddenly.

## **DRIVER'S ATTENTION**

The driver must be cautious in the below situations for the system may not assist the driver and may not work properly.

- The lane can't be visible due to snow, rain, stain, a puddle or other factors.
- The brightness outside changes suddenly such as tunnel enter/exit.
- Not turning on the headlight or the light is weak even at night or in a tunnel.
- Difficult to distinguish the color of the lane maker from the road.
- Driving on a steep grade or a curve.
- Light reflects from the water on the road such as sunlight, streetlight or the light of oncoming vehicles.
- The lens or windshield is stained with foreign matter.
- The sensor cannot detect the lane because of fog, heavy rain or heavy snow.
- The surrounding of the inside rear view mirror temperature is high due to direct light.
- The lane is very wide or narrow.
- The lane marker is damaged or indistinct.
- The shadow is on the lane marker by a median strip.
- There is a mark similar to a lane marker.

- There is a boundary structure.
- The distance from vehicle ahead is very short or the vehicle ahead drives hiding the lane marker.
- The vehicle shakes heavily.
- The lane number increases or decreases or the lane marker are crossing complicatedly.
- Placing something on the dashboard.
- Driving with the sun in front of you.
- Driving in areas under construction.
- The lane marker is more than two.
- The lane marker in a tunnel is hard to distinguish due to dust or grease.
- The lane marker is hard to distinguish after raining at night.
- The lane marker is hard to distinguish due to dust.
- The windshield is fogged by humid air in the vehicle.
- The distance from the vehicle ahead is very short or the vehicle ahead drives covering the lane line.
- The lane is merged or divided.
- Driving through a toll plaza or toll gate.
- There is a boundary structure in the roadway such as a concrete barrier, guardrail and reflector post that is inadvertently being detected by the camera.



## **LKA** malfunction

 If there is a problem with the system a message will appear for 2 seconds with an audible warning. If the problem continues the LKA fail indicator will illuminate.



### LKA fail indicator

The LKA fail indicator (yellow) will illuminate with an audible warning if the LKA is not working properly. we recommend that the system be checked by an authorized HYUNDAI dealer.

# When there is a problem with the system do one of the following:

- Turn the system on after turning the engine off and on again.
- Check if the ignition switch is in the ON position.
- Check if the system is affected by the weather. (ex: fog, heavy rain, etc.)
- Check if there is foreign matter on the camera lens

If the problem is not solved, we recommend that the system be checked by an authorized HYUNDAI dealer.

### LKA system function change

The driver can change LKA to the Lane Departure Warning (LDW) system or change the LKA system mode between Standard LKA and Active LKA from the LCD display. Go to the "User Settings  $\rightarrow$  Driver Assistance  $\rightarrow$  Lane Keeping Assist  $\rightarrow$  Lane Departure Warning/ Standard LKA/Active LKA".

The system is automatically set to Standard LKA if a function is not selected.

#### Lane Departure Warning

LDW system alerts the driver with a visual warning and a warning alarm when the system detects the vehicle departing the lane. The steering wheel will not be controlled.

#### Standard LKA

The Standard LKA mode guides the driver to help keep the vehicle within the lanes. It rarely controls the steering wheel, when the vehicle drives well inside the lanes. However, it starts to control the steering wheel, when the vehicle is about to deviate out of the lane.

#### Active LKA

The Active LKA mode provides more frequent steering wheel control in comparison with the Standard LKA mode. Active LKA can reduce the driver's fatigue to assist the steering for maintaining the vehicle in the middle of the lane.

## ECONOMICAL OPERATION

Your vehicle's fuel economy depends mainly on your style of driving, where you drive and when you drive.

Each of these factors affects how many kilometers (miles) you can get from a liter (gallon) of fuel. To operate your vehicle as economically as possible, use the following driving suggestions to help save money in both fuel and repairs:

- Drive smoothly. Accelerate at a moderate rate. Do not make "jack-rabbit" starts or full-throttle shifts and maintain a steady cruising speed. Do not race between stoplights. Try to adjust your speed to the traffic so you do not have to change speeds unnecessarily. Avoid heavy traffic whenever possible. Always maintain a safe distance from other vehicles so you can avoid unnecessary braking. This also reduces brake wear.
- Drive at a moderate speed. The faster you drive, the more fuel your vehicle uses. Driving at a moderate speed, especially on the highway, is one of the most effective ways to reduce fuel consumption.

- Do not "ride" the brake or clutch pedal. This can increase fuel consumption and also increase wear on these components. In addition, driving with your foot resting on the brake pedal may cause the brakes to overheat, which reduces their effectiveness and may lead to more serious consequences.
- Take care of your tires. Keep them inflated to the recommended pressure. Incorrect inflation, either too much or too little, results in unnecessary tire wear. Check the tire pressures at least once a month.
- Be sure that the wheels are aligned correctly. Improper alignment can result from hitting curbs or driving too fast over irregular surfaces. Poor alignment causes faster tire wear and may also result in other problems as well as greater fuel consumption.

- Keep your vehicle in good condition. For better fuel economy and reduced maintenance costs, maintain your vehicle in accordance with the maintenance schedule in section 7. If you drive your vehicle in severe conditions, more frequent maintenance is required (see section 7 for details).
- Keep your vehicle clean. For maximum service, your vehicle should be kept clean and free of corrosive materials. It is especially important that mud, dirt, ice, etc. not be allowed to accumulate on the underside of the vehicle. This extra weight can result in increased fuel consumption and also contribute to corrosion.
- Travel lightly. Do not carry unnecessary weight in your vehicle. Weight reduces fuel economy.
- Do not let the engine idle longer than necessary. If you are waiting (and not in traffic), turn off your engine and restart only when you're ready to go.

- Remember, your vehicle does not require extended warm-up. After the engine has started, allow the engine to run for 10 to 20 seconds prior to placing the vehicle in gear. In very cold weather, however, give your engine a slightly longer warm-up period.
- Do not "lug" or "over-rev" the engine. Lugging is driving too slowly in too high a gear resulting engine bucking. If this happens, shift to a lower gear. Over-revving is racing the engine beyond its safe limit. This can be avoided by shifting at the recommended speeds.
- Use your air conditioning sparingly. The air conditioning system is operated by engine power so your fuel economy is reduced when you use it.
- Open windows at high speeds can reduce fuel economy.
- Fuel economy is less in crosswinds and headwinds. To help offset some of this loss, slow down when driving in these conditions.

Keeping a vehicle in good operating condition is important both for economy and safety. Therefore, we recommend that the system be serviced by an authorized HYUNDAI dealer.

### WARNING - Engine off during motion

Never turn the engine off to coast down hills or anytime the vehicle is in motion. The power steering and power brakes will not function properly without the engine running. Instead, keep the engine on and downshift to an appropriate gear for engine braking effect. In addition, turning off the ignition while driving could engage the steering wheel lock (if equipped) resulting in loss of vehicle steering which could cause serious injury or death.

## SPECIAL DRIVING CONDITIONS

#### Hazardous driving conditions

When hazardous driving conditions are encountered such as water, snow, ice, mud, sand, or similar hazards, follow these suggestions:

- Drive cautiously and allow extra distance for braking.
- Avoid sudden braking or steering.
- When braking with non-ABS brakes pump the brake pedal with a light upand-down motion until the vehicle is stopped.

A WARNING - ABS Do not pump the brake pedal on a vehicle equipped with ABS.

- If stalled in snow, mud, or sand, use second gear. Accelerate slowly to avoid spinning the drive wheels.
- Use sand, rock salt, tire chains, or other non-slip material under the drive wheels to provide traction when stalled in ice, snow, or mud.

A WARNING - Downshifting Downshifting with dual clutch transmission, while driving on slippery surfaces can cause an accident. The sudden change in tire speed could cause the tires to skid. Be careful when downshifting on slippery surfaces.

#### Reducing the risk of a rollover

This multi-purpose passenger vehicle is defined as a Multi Purpose Vehicle (MPV). MPV's have higher ground clearance and a narrower track to make them capable of performing in a wide variety of road applications. Specific design characteristics give them a higher center of gravity than ordinary vehicles. An advantage of the higher ground clearance is a better view of the road, which allows you to anticipate problems. They are not designed for cornering at the same speeds as conventional passenger vehicles. Due to this risk, driver and passengers are strongly recommended to buckle their seat belts. In a rollover crash, an unbelted person is more likely to die than a person wearing a seat belt. There are steps that a driver can make to reduce the risk of a rollover. If at all possible, avoid sharp turns or abrupt maneuvers, do not load your roof rack with heavy cargo, and never modify your vehicle in any way.

# A WARNING - Rollover

As with other Multi Purpose Vehicle (MPV), failure to operate this vehicle correctly may result in loss of control, an accident or vehicle rollover.

- Utility vehicles have a significantly higher rollover rate than other types of vehicles.
- Specific design characteristics (higher ground clearance, narrower track, etc.) give this vehicle a higher center of gravity than ordinary vehicles.
- A MPV is not designed for cornering at the same speeds as conventional vehicles.
- Avoid sharp turns or abrupt maneuvers.
- In a rollover crash, an unbelted person is significantly more likely to die than a person wearing a seat belt. Make sure everyone in the vehicle is properly buckled up.

## A WARNING

Your vehicle is equipped with tires designed to provide safe ride and handling capability. Do not use a size and type of tire and wheel that is different from the one that is originally installed on your vehicle. It can affect the safety and performance of your vehicle, which could lead to steering failure or rollover and serious injury. When replacing the tires, be sure to equip all four tires with the tire and wheel of the same size, type, tread, brand and load-carrying capacity. If you nevertheless decide to equip your vehicle with any tire/wheel combination not recommended by HYUNDAI for off road driving, you should not use these tires for highway driving.

#### **Rocking the vehicle**

If it is necessary to rock the vehicle to free it from snow, sand, or mud, first turn the steering wheel right and left to clear the area around your front wheels. Then, shift back and forth between 1 (First) and R (Reverse) in vehicles equipped with a manual transaxle or R (Reverse) and any forward gear in vehicles equipped with dual clutch transmission. Do not race the engine, and spin the wheels as little as possible. If you are still stuck after a few tries, have the vehicle pulled out by a tow vehicle to avoid engine overheating and possible damage to the transaxle.

## ! CAUTION

Prolonged rocking may cause engine over-heating, transaxle damage or failure, and tire damage. A WARNING - Spinning tires Do not spin the wheels, especially at speeds more than 56 km/h (35 mph). Spinning the wheels at high speeds when the vehicle is stationary could cause a tire to overheat which could result in tire damage that may injure bystanders.

### **\* NOTICE**

The ESC system should be turned OFF prior to rocking the vehicle.

# A WARNING

If your vehicle becomes stuck in snow, mud, sand, etc., then you may attempt to rock the vehicle free by moving it forward and backward. Do not attempt this procedure if people or objects are anywhere near the vehicle. During the rocking operation the vehicle may suddenly move forward or backward as it becomes unstuck, causing injury or damage to nearby people or objects.

#### Smooth cornering

Avoid braking or gear changing in corners, especially when roads are wet. Ideally, corners should always be taken under gentle acceleration. If you follow these suggestions, tire wear will be held to a minimum.

### **Driving at night**

Because night driving presents more hazards than driving in the daylight, here are some important tips to remember:

- Slow down and keep more distance between you and other vehicles, as it may be more difficult to see at night, especially in areas where there may not be any street lights.
- Adjust your mirrors to reduce the glare from other driver's headlights.
- Keep your headlights clean and properly aimed on vehicles not equipped with the automatic headlight aiming feature. Dirty or improperly aimed headlights will make it much more difficult to see at night.
- Avoid staring directly at the headlights of oncoming vehicles. You could be temporarily blinded, and it will take several seconds for your eyes to readjust to the darkness.

#### Driving in the rain

Rain and wet roads can make driving dangerous, especially if you're not prepared for the slick pavement. Here are a few things to consider when driving in the rain:

- A heavy rainfall will make it harder to see and will increase the distance needed to stop your vehicle, so slow down.
- Keep your windshield wiping equipment in good shape. Replace your windshield wiper blades when they show signs of streaking or missing areas on the windshield.
- If your tires are not in good condition, making a quick stop on wet pavement can cause a skid and possibly lead to an accident. Be sure your tires are in good shape.
- Turn on your headlights to make it easier for others to see you.
- Driving too fast through large puddles can affect your brakes. If you must go through puddles, try to drive through them slowly.
- If you believe you may have gotten your brakes wet, apply them lightly while driving until normal braking operation returns.

### Driving in flooded areas

Avoid driving through flooded areas unless you are sure the water is no higher than the bottom of the wheel hub. Drive through any water slowly. Allow adequate stopping distance because brake performance may be affected. After driving through water, dry the brakes by gently applying them several times while the vehicle is moving slowly.

#### **Driving off-road**

Drive carefully off-road because your vehicle may be damaged by rocks of roots of trees. Become familiar with the off-road conditions where you are going to drive before you begin driving.

#### **Highway driving**

**Tires** 

Adjust the tire inflation pressures to specification. Low tire inflation pressures will result in overheating and possible failure of the tires.

Avoid using worn or damaged tires which may result in reduced traction or tire failure.

## **\* NOTICE**

Never exceed the maximum tire inflation pressure shown on the tires.

# A WARNING

- Underinflated or overinflated tires can cause poor handling, loss of vehicle control, and sudden tire failure leading to accidents, injuries, and even death. Always check the tires for proper inflation before driving. For proper tire pressures, refer to section 8, "Tires and wheels".
- Driving on tires with no or insufficient tread is dangerous. Wornout tires can result in loss of vehicle control, collisions, injury, and even death. Worn-out tires should be replaced as soon as possible and should never be used for driving. Always check the tire tread before driving your vehicle. For further information and tread limits, refer to section 7, "Tires and wheels".

*Fuel, engine coolant and engine oil* High speed travel consumes more fuel than urban motoring. Do not forget to check both engine coolant and engine oil.

#### Drive belt

A loose or damaged drive belt may result in overheating of the engine.

## WINTER DRIVING



Severe weather conditions in the winter result in greater wear and other problems. To minimize the problems of winter driving, you should follow these suggestions:

### Snowy or Icy conditions

To drive your vehicle in deep snow, it may be necessary to use snow tires or to install tire chains on your tires. If snow tires are needed, it is necessary to select tires equivalent in size and type of the original equipment tires. Failure to do so may adversely affect the safety and handling of your vehicle. Furthermore. speeding, rapid acceleration, sudden brake applications, and sharp turns are potentially very hazardous practices. During deceleration, use engine braking to the fullest extent. Sudden brake applications on snowy or icy roads may cause skids to occur. You need to keep sufficient distance between the vehicle in operation in front and your vehicle. Also, apply the brake gently. It should be noted that installing tire chains on the tire will provide a greater driving force, but will not prevent side skids.

## **\* NOTICE**

Tire chains are not legal in all countries. Check the country laws before fitting tire chains.

#### Snow tires

If you mount snow tires on your vehicle, make sure they are radial tires of the same size and load range as the original tires. Mount snow tires on all four wheels to balance your vehicle's handling in all weather conditions. Keep in mind that the traction provided by snow tires on dry roads may not be as high as your vehicle's original equipment tires. You should drive cautiously even when the roads are clear. Check with the tire dealer for maximum speed recommendations.

A WARNING - Snow tire size Snow tires should be equivalent in size and type to the vehicle's standard tires. Otherwise, the safety and handling of your vehicle may be adversely affected.

Do not install studded tires without first checking local, state and municipal regulations for possible restrictions against their use.



#### Tire chains

Since the sidewalls of radial tires are thinner, they can be damaged by mounting some types of snow chains on them. Therefore, the use of snow tires is recommended instead of snow chains. Do not mount tire chains on vehicles equipped with aluminum wheels; snow chains may cause damage to the wheels. If snow chains must be used, use wiretype chains with a thickness of less than 12 mm (0.47 in). Damage to your vehicle caused by improper snow chain use is not covered by your vehicle manufacturers warranty.

Install tire chains only on the front tires.

## ! CAUTION

- Make sure the snow chains are the correct size and type for your tires. Incorrect snow chains can cause damage to the vehicle body and suspension and may not be covered by your vehicle manufacturer warranty. Also, the snow chain connecting hooks may be damaged from contacting vehicle components causing the snow chains to come loose from the tire. Make sure the snow chains are SAE class "S" certified.
- · Always check chain installation for proper mounting after driving approximately 0.5 to 1 km (0.3 to 0.6 miles) to ensure safe mounting. Retighten or remount the chains if they are loose.

#### Chain installation

When installing chains, follow the manufacturer's instructions and mount them as tightly as you can. Drive slowly with chains installed. If you hear the chains contacting the body or chassis, stop and tighten them. If they still make contact, slow down until it stops. Remove the chains as soon as you begin driving on cleared roads

#### A WARNING - Mounting chains

When mounting snow chains, park the vehicle on level ground away from traffic. Turn on the vehicle Hazard Warning flashers and place a triangular emergency warning device behind the vehicle if available. Always place the vehicle in P (Park), apply the parking brake and turn off the engine before installing snow chains.

5 93

# A WARNING - Tire chains

- The use of chains may adversely affect vehicle handling.
- Do not exceed 30 km/h (20 mph) or the chain manufacturer's recommended speed limit, whichever is lower.
- Drive carefully and avoid bumps, holes, sharp turns, and other road hazards, which may cause the vehicle to bounce.
- Avoid sharp turns or lockedwheel braking.

# ! CAUTION

- Chains that are the wrong size or improperly installed can damage your vehicle's brake lines, suspension, body and wheels.
- Stop driving and retighten the chains any time you hear them hitting the vehicle.

# Use high quality ethylene glycol coolant

Your vehicle is delivered with high quality ethylene glycol coolant in the cooling system. It is the only type of coolant that should be used because it helps prevent corrosion in the cooling system, lubricates the water pump and prevents freezing. Be sure to replace or replenish your coolant in accordance with the maintenance schedule in section 7. Before winter, have your coolant tested to assure that its freezing point is sufficient for the temperatures anticipated during the winter.

#### Check battery and cables

Winter puts additional burdens on the battery system. Visually inspect the battery and cables as described in section 7. We recommend that the level of charge in your battery be checked by an authorized HYUNDAI dealer.

# Change to "winter weight" oil if necessary

In some climates it is recommended that a lower viscosity "winter weight" oil be used during cold weather. See section 8 for recommendations. If you aren't sure what weight oil you should use, we recommend that you consult an authorized HYUNDAI dealer.

# Check spark plugs and ignition system

Inspect your spark plugs as described in section 7 and replace them if necessary. Also check all ignition wiring and components to be sure they are not cracked, worn or damaged in any way.

### To keep locks from freezing

To keep the locks from freezing, squirt an approved de-icer fluid or glycerine into the key opening. If a lock is covered with ice, squirt it with an approved de-icing fluid to remove the ice. If the lock is frozen internally, you may be able to thaw it out by using a heated key. Handle the heated key with care to avoid injury.

# Use approved window washer anti-freeze in system

To keep the water in the window washer system from freezing, add an approved window washer anti-freeze solution in accordance with instructions on the container. Window washer anti-freeze is available from an authorized HYUNDAI dealer and most auto parts outlets. Do not use engine coolant or other types of anti-freeze as these may damage the paint finish.

# Don't let your parking brake freeze

Under some conditions your parking brake can freeze in the engaged position. This is most likely to happen when there is an accumulation of snow or ice around or near the rear brakes or if the brakes are wet. If there is a risk the parking brake may freeze, apply it only temporarily while you put the shift lever in P (dual clutch transmission) or in first or reverse gear (manual transaxle) and block the rear wheels so the vehicle cannot roll. Then release the parking brake.

#### Don't let ice and snow accumulate underneath

Under some conditions, snow and ice can build up under the fenders and interfere with the steering. When driving in severe winter conditions where this may happen, you should periodically check underneath the vehicle to be sure the movement of the front wheels and the steering components is not obstructed.

#### Carry emergency equipment

Depending on the severity of the weather, you should carry appropriate emergency equipment. Some of the items you may want to carry include tire chains, tow straps or chains, flashlight, emergency flares, sand, shovel, jumper cables, window scraper, gloves, ground cloth, coveralls, blanket, etc.

#### Don't place foreign objects or materials in the engine compartment

Placement of foreign objects or materials which prevent cooling of the engine, in the engine compartment, may cause a failure or combustion. The manufacturer is not responsible for the damage caused by such placement.

### **TRAILER TOWING**

If you are considering towing with your vehicle, you should first check with your country's Department of Motor Vehicles to determine their legal requirements.

Since laws vary the requirements for towing trailers, cars, or other types of vehicles or apparatus may differ. Ask an authorized HYUNDAI dealer for further details before towing.

WARNING - Towing a trailer If you don't use the correct equipment and/or drive improperly, you can lose control when you pull a trailer. For example, if the trailer is too heavy, the brakes may not work wellor even at all. You and your passengers could be seriously or fatally injured. Pull a trailer only if you have followed all the steps in this section.

WARNING - Weight limits Before towing, make sure the total trailer weight, GCW (gross combination weight), GVW (gross vehicle weight), GAW (gross axle weight ) and trailer tongue load are all within the limits. WARNING When you tow the trailer, make sure that you turn off the ISG function.

#### **\* NOTICE - For Europe**

- The technically permissible maximum load on the rear axle(s) may be exceeded by not more than 15 % and the technically permissible maximum laden mass of the vehicle may be exceeded by not more than 10 % or 100 kg (220.4 lbs), whichever value is lower. In this case, do not exceed 100 km/h (62.1 mph) for vehicle of category M1 or 80 km/h (49.7 mph) for vehicle of category N1.
- When towing a trailer, the additional load imposed at the trailer coupling device may cause the rear tire maximum load ratings to be exceeded, but not by more than 15%. In such a case, do not exceed 100km/h, and the rear tire pressure should be at least 20 kPa (0.2 bar) above the tire pressure(s) as recommended for normal use (i.e. without a trailer attached).

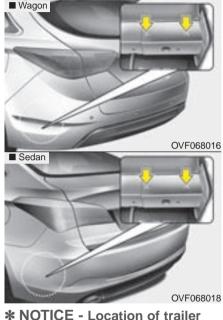
### ! CAUTION

Pulling a trailer improperly can damage your vehicle and result in costly repairs not covered by your warranty. To pull a trailer correctly, follow the advice in this section.

Your vehicle can tow a trailer. To identify what the vehicle trailering capacity is for your vehicle, you should read the information in "Weight of the trailer" that appears later in this section.

Remember that trailering is different than just driving your vehicle by itself. Trailering means changes in handling, durability, and fuel economy. Successful, safe trailering requires correct equipment, and it has to be used properly.

This section contains many time-tested, important trailering tips and safety rules. Many of these are important for your safety and that of your passengers. Please read this section carefully before you pull a trailer. Load-pulling components such as the engine, transaxle, wheel assemblies, and tires are forced to work harder against the load of the added weight. The engine is required to operate at relatively higher speeds and under greater loads. This additional burden generates extra heat. The trailer also considerably adds wind resistance, increasing the pulling requirements.



\* NOTICE - Location of trailer mounting

The mounting hole for hitches are located on both sides of the underbody behind the rear tires.

#### Hitches

It's important to have the correct hitch equipment. Crosswinds, large trucks going by, and rough roads are a few reasons why you'll need the right hitch. Here are some rules to follow:

• Do you have to make any holes in the body of your vehicle when you install a trailer hitch? If you do, then be sure to seal the holes later when you remove the hitch.

If you do not seal them, deadly carbon monoxide (CO) from your exhaust can get into your vehicle, as well as dirt and water.

- The bumpers on your vehicle are not intended for hitches. Do not attach rental hitches or other bumper-type hitches to them. Use only a framemounted hitch that does not attach to the bumper.
- A HYUNDAI accessory trailer hitch is available at an authorized HYUNDAI dealer.

#### Safety chains

You should always attach chains between your vehicle and your trailer. Cross the safety chains under the tongue of the trailer so that the tongue will not drop to the road if it becomes separated from the hitch.

Instructions about safety chains may be provided by the hitch manufacturer or by the trailer manufacturer. Follow the manufacturer's recommendation for attaching safety chains. Always leave just enough slack so you can turn with your trailer. And, never allow safety chains to drag on the ground.

#### **Trailer brakes**

If your trailer is equipped with a braking system, make sure it conforms to your country's regulations and that it is properly installed and operating correctly.

If your trailer weight exceeds the maximum allowed weight without trailer brakes, then the trailer will also require its own brakes as well. Be sure to read and follow the instructions for the trailer brakes so you'll be able to install, adjust and maintain them properly.

 Do not tap into or modify your vehicle's brake system.

A WARNING - Trailer brakes Do not use a trailer with its own brakes unless you are absolutely certain that you have properly set up the brake system. This is not a task for amateurs. Use an experienced, competent trailer shop for this work.

#### Loading the trailer

The weight distribution between the car and trailer should be balanced. Make sure that the load in the trailer is equally distributed and it is not front-heavy or tailheavy.

The heavy load in the trailer should be placed above the axle or as close as possible to the axle. And, secure loads properly on the trailer.

#### Tire pressure

Follow the trailer manufacturer's tire pressure recommendations for the trailer tires.

When towing, inflate tires in vehicle to the maximum permissible pressure referring to the tire pressure label.

#### Driving with a trailer

Towing a trailer requires a certain amount of experience. Before setting out for the open road, you must get to know your trailer. Acquaint yourself with the feel of handling and braking with the added weight of the trailer. And always keep in mind that the vehicle you are driving is now a good deal longer and not nearly so responsive as your vehicle is by itself.

Before you start, check the trailer hitch and platform, safety chains, electrical connector(s), lights, tires and mirror adjustment. If the trailer has electric brakes, start your vehicle and trailer moving and then apply the trailer brake controller by hand to be sure the brakes are working. This lets you check your electrical connection at the same time.

Do not release the parking brake until the engine starts to move the vehicle forward.

And release the brake pedal when you feel that the vehicle wants to move forward.

During your trip, check occasionally to be sure that the load is secure, and that the lights and any trailer brakes are still working.

#### Following distance

Stay at least twice as far behind the vehicle ahead as you would when driving your vehicle without a trailer. This can help you avoid situations that require heavy braking and sudden turns.

#### Passing

You'll need more passing distance up ahead when you're towing a trailer. And, because of the increased vehicle length, you'll need to go much farther beyond the passed vehicle before you can return to your lane.

#### Backing up

Hold the bottom of the steering wheel with one hand. Then, to move the trailer to the left, just move your hand to the left. To move the trailer to the right, move your hand to the right. Always back up slowly and, if possible, have someone guide you.

#### Making turns

When you're turning with a trailer, make wider turns than normal. Do this so your trailer won't strike soft shoulders, curbs, road signs, trees, or other objects. Avoid jerky or sudden maneuvers. Signal well in advance.

#### Turn signals when towing a trailer

When you tow a trailer, your vehicle has to have a different turn signal flasher and extra wiring. The green arrows on your instrument panel will flash whenever you signal a turn or lane change. Properly connected, the trailer lights will also flash to alert other drivers you're about to turn, change lanes, or stop.

When towing a trailer, the green arrows on your instrument panel will flash for turns even if the bulbs on the trailer are burned out. Thus, you may think drivers behind you are seeing your signals when, in fact, they are not. It is important to check occasionally to be sure the trailer bulbs are still working. You must also check the lights every time you disconnect and then reconnect the wires.

Do not connect a trailer lighting system directly to your vehicle's lighting system. Use only an approved trailer wiring harness.

An authorized HYUNDAI dealer can assist you in installing the wiring harness.

### **A** WARNING

Failure to use an approved trailer wiring harness could result in damage to the vehicle electrical system and/or personal injury.

#### Driving on grades

Reduce speed and shift to a lower gear before you start down a long or steep downgrade. If you don't shift down, you might have to use your brakes so much that they would get hot and no longer operate efficiently.

On a long uphill grade, shift down and reduce your speed to around 70 km/h (45 mph) to reduce the possibility of engine and transaxle overheating.

If your trailer weighs more than the maximum trailer weight without trailer brakes and you have dual clutch transmission, you should drive in D (Drive) when towing a trailer.

Operating your vehicle in D (Drive) when towing a trailer will minimize heat build up and extend the life of your transaxle.

### ! CAUTION

• When towing a trailer on steep grades (in excess of 6%) pay close attention to the engine coolant temperature gauge to ensure the engine does not overheat.

(Continued)

#### (Continued)

If the needle of the coolant temperature gauge moves across the dial towards "130/H (HOT)", pull over and stop as soon as it is safe to do so, and allow the engine to idle until it cools down. You may proceed once the engine has cooled sufficiently.

- You must decide driving speed depending on trailer weight and uphill grade to reduce the possibility of engine and transaxle overheating.
- When towing a trailer on steep grades, the clutch in the transmission could overheat.

When the clutch is overheated, the safe protection mode engages. If the safe protection mode engages, the gear position indicator on the cluster blinks with a chime sound.

At this time, a warning message will appear on the LCD display and driving may not be smooth.

If you ignore this warning, the driving condition may become worse. To return the normal driving condition, stop the vehicle on flat road and apply the foot brake for a few minutes before driving off.

#### Parking on hills

Generally, if you have a trailer attached to your vehicle, you should not park your vehicle on a hill. People can be seriously or fatally injured, and both your vehicle and the trailer can be damaged if unexpectedly roll down hill.

## WARNING - Parking on a hill

Parking your vehicle on a hill with a trailer attached could cause serious injury or death, should the trailer break loose.

It can be very dangerous to hold your vehicle by applying accelerator on a hill.

However, if you ever have to park your trailer on a hill, here is how to do it:

- 1. Pull the vehicle into the parking space. Turn the steering wheel in the direction of the curb (right if headed down hill, left if headed up hill).
- 2. If the vehicle has a manual transaxle, place the car in neutral. If the vehicle has dual clutch transmission, place the car in P (Park).
- 3. Set the parking brake and shut off the vehicle.

- 4. Place chocks under the trailer wheels on the down hill side of the wheels.
- 5. Start the vehicle, hold the brakes, shift to neutral, release the parking brake and slowly release the brakes until the trailer chocks absorb the load.
- Reapply the brakes, reapply the parking brake and shift the vehicle to R (Reverse) for manual transaxle or P (Park) for dual clutch transmission.
- 7. Shut off the vehicle and release the vehicle brakes but leave the parking brake set.

#### A WARNING - Parking brake

It can be dangerous to get out of your vehicle if the parking brake is not firmly set.

If you have left the engine running, the vehicle can move suddenly. You or others could be seriously or fatally injured.

#### When you are ready to leave after parking on a hill

- 1. With the manual transaxle in Neutral or dual clutch transmission in P (Park), apply your brakes and hold the brake pedal down while you:
  - Start your engine;
  - · Shift into gear; and
  - Release the parking brake.
- 2. Slowly remove your foot from the brake pedal.
- 3. Drive slowly until the trailer is clear of the chocks.
- 4. Stop and have someone pick up and store the chocks.

#### Maintenance when trailer towing

Your vehicle will need service more often when you regularly pull a trailer. Important items to pay particular attention to include engine oil, axle lubricant and cooling system fluid. Brake condition is another important item to frequently check. Each item is covered in this manual, and the Index will help you find them quickly. If you're trailering, it is a good idea to review these sections before you start your trip. Do not forget to also maintain your trailer and hitch. Follow the maintenance schedule that accompanied your trailer and check it periodically. Preferably, conduct the check at the start of each day's driving. Most importantly, all hitch nuts and bolts should be tight.

### ! CAUTION

- Due to higher load during trailer usage, overheating might occur in hot days or during uphill driving. If the coolant gauge indicates over-heating, switch off the air conditioner and stop the vehicle in a safe area to cool down the engine.
- When towing check transaxle fluid more frequently.
- If your vehicle is not equipped with an air conditioner, you should install a condenser fan to improve engine performance when towing a trailer.

### If you do decide to pull a trailer

Here are some important points if you decide to pull a trailer:

- Consider using a sway control. You can ask a hitch dealer about sway control.
- Do not do any towing with your car during its first 2,000 km (1,200 miles) in order to allow the engine to properly break in. Failure to heed this caution may result in serious engine or transaxle damage.
- When towing a trailer, be sure to consult an authorized HYUNDAI dealer for further information on additional requirements such as a towing kit, etc.
- Always drive your vehicle at a moderate speed (less than 100 km/h (60 mph)).
- On a long uphill grade, do not exceed 70 km/h (45 mph) or the posted towing speed limit, whichever is lower.
- The chart contains important considerations that have to do with weight:

	Engine	Gasoline Engine		Diesel I	Engine		
	DCT		1.7 L		Smartstream 1.6 L		
			N4/T	DOT			
Item		M/T	For Europe	Except Europe	- M/T (Low)	M/T (High)	DCT (High)
Maximum trailer weight	With brake System	1300 (2866)	1500 (3307)	1300 (2866)	1500 (3307)	1800 (3968)	1500 (3307)
kg (lbs.)	Without brake System	600 (1323)	700 (1543)	600 (1323)	700 (1543)	700 (1543)	700 (1543)
Maximum peri vertical load o device		60 (132)	70 (154)	60 (132)	80 (176)	80 (176)	70 (154)
Recommende from rear whe coupling point	el center to		1180 (4	46.4)*1/ 1150	(45.2)*2		

\*1 : Wagon

\*2 : Sedan

M/T : Manual transaxle

DCT : Dual clutch transmission



#### Weight of the trailer

What is the maximum safe weight of a trailer? It should never weigh more than the maximum trailer weight with trailer brakes. But even that can be too heavy. It depends on how you plan to use your trailer. For example, speed, altitude, road grades, outside temperature and how often your vehicle is used to pull a trailer are all important. The ideal trailer weight can also depend on any special equipment that you have on your vehicle.

#### Weight of the trailer tongue

The tongue load of any trailer is an important weight to measure because it affects the total gross vehicle weight (GVW) of your vehicle. This weight includes the curb weight of the vehicle, any cargo you may carry in it, and the people who will be riding in the vehicle. And if you will tow a trailer, you must add the tongue load to the GVW because your vehicle will also be carrying that weight.

The trailer tongue should weigh a maximum of 10% of the total loaded trailer weight, within the limits of the maximum permissible trailer tongue load. After you've loaded your trailer, weigh the trailer and then the tongue, separately, to see if the weights are proper. If they aren't, you may be able to correct them simply by moving some items around in the trailer.

### A WARNING - Trailer

- Never load a trailer with more weight in the rear than in the front. The front should be loaded with approximately 60% of the total trailer load; the rear should be loaded with approximately 40% of the total trailer load.
- Never exceed the maximum weight limits of the trailer or trailer towing equipment. Improper loading can result in damage to your vehicle and/or personal injury. Check weights and loading at a commercial scale or highway patrol office equipped with scales.
- An improperly loaded trailer can cause loss of vehicle control.

#### **\* NOTICE**

With increasing altitude the engine performance decreases. From 1.000 m above sea level and for every 1.000 m thereafter 10% of vehicle/trailer weight (trailer weighter + gross vehicle weight) must be deducted.

### **VEHICLE WEIGHT**

This section will guide you in the proper loading of your vehicle and/or trailer, to keep your loaded vehicle weight within its design rating capability, with or without a trailer. Properly loading your vehicle will provide maximum return of the vehicle design performance. Before loading your vehicle, familiarize yourself with the following terms for determining your vehicle's weight ratings, with or without a trailer, from the vehicle's specifications and the certification label:

#### Base curb weight

This is the weight of the vehicle including a full tank of fuel and all standard equipment. It does not include passengers, cargo, or optional equipment.

#### Vehicle curb weight

This is the weight of your new vehicle when you picked it up from your dealer plus any aftermarket equipment.

#### Cargo weight

This figure includes all weight added to the Base Curb Weight, including cargo and optional equipment.

#### GAW (Gross axle weight)

This is the total weight placed on each axle (front and rear) - including vehicle curb weight and all payload.

#### GAWR (Gross axle weight rating)

This is the maximum allowable weight that can be carried by a single axle (front or rear). These numbers are shown on the certification label.

The total load on each axle must never exceed its GAWR.

#### GVW (Gross vehicle weight)

This is the Base Curb Weight plus actual Cargo Weight plus passengers.

#### GVWR (Gross vehicle weight rating)

This is the maximum allowable weight of the fully loaded vehicle (including all options, equipment, passengers and cargo). The GVWR is shown on the certification label.

#### Overloading

A WARNING - Vehicle weight The gross axle weight rating (GAWR) and the gross vehicle weight rating (GVWR) for your vehicle are on the certification label attached to the driver's (or front passenger's) door. Exceeding these ratings can cause an accident or vehicle damage. You can calculate the weight of your load by weighing the items (and people) before putting them in the vehicle. Be careful not to overload your vehicle.

Road warning / 6-2 In case of an emergency while driving / 6-3 If the engine does not start / 6-4 Emergency starting / 6-5 If the engine overheats / 6-7 If you have a flat tire (with Spare Tire) / 6-8 Tire pressure monitoring system (TPMS) / 6-18 If you have a flat tire (with TireMobilityKit) - Type A / 6-23 If you have a flat tire (with Tire Mobility Kit) - Type B / 6-29 Towing / 6-36 Emergency commodity / 6-41

## What to do in an emergency

6

### **ROAD WARNING**



Hazard warning flasher

The hazard warning flasher serves as a warning to other drivers to exercise extreme caution when approaching, overtaking, or passing your vehicle.

It should be used whenever emergency repairs are being made or when the vehicle is stopped near the edge of a roadway.

Press the flasher switch with the ignition switch in any position. The flasher switch is located in the center console switch panel. All turn signal lights will flash simultaneously.

- The hazard warning flasher operates whether your vehicle is running or not.
- The turn signals do not work when the hazard flasher is on.
- The hazard warning flasher should always be on while the vehicle is being towed.

### IN CASE OF AN EMERGENCY WHILE DRIVING

## If the engine stalls at a crossroad or crossing

- If the engine stalls at a crossroad or crossing, set the shift lever in the N (Neutral) position and then push the vehicle to a safe place.
- If your vehicle has a manual transaxle not equipped with a ignition lock switch, the vehicle can move forward by shifting to the 2(Second) or 3(Third) gear and then turning the starter without depressing the clutch pedal.

#### If you have a flat tire while driving

If a tire goes flat while you are driving:

- 1. Take your foot off the accelerator pedal and let the vehicle slow down while driving straight ahead. Do not apply the brakes immediately or attempt to pull off the road as this may cause a loss of control. When the vehicle has slowed to such a speed that it is safe to do so, brake carefully and pull off the road. Drive off the road as far as possible and park on firm, level ground. If you are on a divided highway, do not park in the median area between the two traffic lanes.
- When the vehicle is stopped, turn on your emergency hazard flashers, set the parking brake and put the transaxle in P (dual clutch transmission) or reverse (manual transaxle).
- 3. Have all passengers get out of the vehicle. Be sure they all get out on the side of the vehicle that is away from traffic.
- 4. When changing a flat tire, follow the instruction provided later in this section.

#### If engine stalls while driving

- 1. Reduce your speed gradually, keeping a straight line. Move cautiously off the road to a safe place.
- 2. Turn on your emergency flashers.
- 3. Try to start the engine again. If your vehicle will not start, we recommend that you consult an authorized HYUNDAI dealer.

### IF THE ENGINE DOES NOT START

## If engine doesn't turn over or turns over slowly

- If your vehicle has dual clutch transmission, be sure the shift lever is in N (Neutral) or P (Park) and the emergency brake is set.
- 2. Check the battery connections to be sure they are clean and tight.
- 3. Turn on the interior light. If the light dims or goes out when you operate the starter, the battery is discharged.
- 4. Check the starter connections to be sure they are securely tightened.
- 5. Do not push or pull the vehicle to start it. See instructions for "Jump starting".

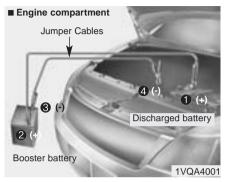
### A WARNING

If the engine does not start, do not push or pull the vehicle to start it. This could result in a collision or cause other damage. In addition, push or pull starting may cause the catalytic converter (if equipped) to be overloaded and create a fire hazard.

## If engine turns over normally but does not start

- 1. Check fuel level.
- With the ignition switch in the LOCK/ OFF position, check all connectors at ignition, coil and spark plugs. Reconnect any that may be disconnected or loose.
- 3. Check the fuel line in the engine compartment.
- 4. If the engine still does not start, we recommend that you call an authorized HYUNDAI dealer.

### **EMERGENCY STARTING**



Connect cables in numerical order and disconnect in reverse order.

#### Jump starting

Jump starting can be dangerous if done incorrectly. Therefore, to avoid harm to yourself or damage to your vehicle or battery, follow the jump starting procedures. If in doubt, we strongly recommend that you have a competent technician or towing service jump start your vehicle.

### ! CAUTION

Use only a 12-volt jumper system. You can damage a 12-volt starting motor, ignition system, and other electrical parts beyond repair by use of a 24-volt power supply (either two 12-volt batteries in series or a 24-volt motor generator set).

### **A** WARNING - Battery

Never attempt to check the electrolyte level of the battery as this may cause the battery to rupture or explode causing serious injury.

### A WARNING - Battery

 Keep all flames or sparks away from the battery. The battery produces hydrogen gas which may explode if exposed to flame or sparks.

If these instructions are not followed exactly, serious personal injury and damage to the vehicle may occur! If you are not sure how to follow this procedure, seek qualified assistance. Automobile batteries contain sulfuric acid. This is poisonous and highly corrosive. When jump starting, wear protective glasses and be careful not to get acid on yourself, your clothing or on the vehicle.

- Do not attempt to jump start the vehicle if the discharged battery is frozen or if the electrolyte level is low; the battery may rupture or explode.
- Do not allow the (+) and (-) jumper cables to touch. It may cause sparks.
- The battery may rupture or explode when you jump start with a low or frozen battery.

#### Jump starting procedure

- .! CAUTION AGM battery (if equipped)
- Absorbent Glass Matt (AGM) batteries are maintenance-free and we recommend that the AGM battery be serviced by an authorized HYUNDAI repairer. For charging your AGM battery, use only fully automatic battery chargers that are specially developed for AGM batteries.
- When replacing the AGM battery, we recommend that you use parts for replacement from an authorized HYUNDAI dealer.
- Do not open or remove the cap on top of the battery. This may cause leaks of internal electrolyte that could result in severe injury.
- If the AGM battery is reconnected or replaced, ISG function will not operate immediately.

If you want to use the ISG function, the battery sensor needs to be calibrated for approximately 4 hours with the ignition off.

- 1. Make sure the booster battery is 12-volt and that its negative terminal is grounded.
- 2. If the booster battery is in another vehicle, do not allow the vehicles to touch.
- 3. Turn off all unnecessary electrical loads.
- 4. Connect the jumper cables in the exact sequence shown in the illustration. First connect one end of a jumper cable to the positive terminal of the discharged battery (1), then connect the other end to the positive terminal on the booster battery (2). Proceed to connect one end of the other jumper cable to the negative terminal of the booster battery (3), then the other end to a solid, stationary, metallic point (for example, the engine lifting bracket) away from the battery (4). Do not connect it to or near any part that moves when the engine is cranked.

Do not allow the jumper cables to contact anything except the correct battery terminals or the correct ground. Do not lean over the battery when making connections.

### **!** CAUTION - Battery cables

Do not connect the jumper cable from the negative terminal of the booster battery to the negative terminal of the discharged battery. This can cause the discharged battery to overheat and crack, releasing battery acid. 5. Start the engine of the vehicle with the booster battery and let it run at 2,000 rpm, then start the engine of the vehicle with the discharged battery.

If the cause of your battery discharging is not apparent, we recommend that the system be checked by an authorized HYUNDAI dealer.

#### **Push-starting**

Your manual transaxle-equipped vehicle should not be push-started because it might damage the emission control system. Vehicles equipped with dual clutch transmission cannot be push-started. Follow the directions in this section for jump-starting.

### A WARNING

Never tow a vehicle to start it because the sudden surge forward when the engine starts could cause a collision with the tow vehicle.

### IF THE ENGINE OVERHEATS

If your temperature gauge indicates overheating, you will experience a loss of power, or hear loud pinging or knocking, the engine is probably too hot. If this happens, you should:

- 1. Pull off the road and stop as soon as it is safe to do so.
- 2. Place the shift lever in P (dual clutch transmission) or neutral (manual transaxle) and set the parking brake. If the air conditioning is on, turn it off.
- 3. If engine coolant is running out under the vehicle or steam is coming out from the hood, stop the engine. Do not open the hood until the coolant has stopped running or the steaming has stopped. If there is no visible loss of engine coolant and no steam, leave the engine running and check to be sure the engine cooling fan is operating. If the fan is not running, turn the engine off.
- 4. Check to see if the water pump drive belt is missing. If it is not missing, check to see that it is tight. If the drive belt seems to be satisfactory, check for coolant leaking from the radiator, hoses or under the vehicle. (If the air conditioning had been in use, it is normal for cold water to be draining from it when you stop).

### A WARNING

While the engine is running, keep hair, hands and clothing away from moving parts such as the fan and drive belts to prevent injury.

5. If the water pump drive belt is broken or engine coolant is leaking out, stop the engine immediately and we recommend that you call an authorized HYUNDAI dealer.

### A WARNING

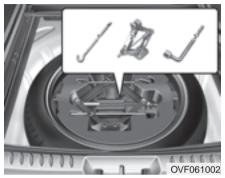
Do not remove the radiator cap when the engine is hot. This can allow coolant to blow out of the opening and cause serious burns.

- 6. If you cannot find the cause of the overheating, wait until the engine temperature has returned to normal. Then, if coolant has been lost, carefully add coolant to the reservoir to bring the fluid level in the reservoir up to the halfway mark.
- 7. Proceed with caution, keeping alert for further signs of overheating. If overheating happens again, we recommend that you call an authorized HYUNDAI dealer.

### ! CAUTION

- Serious loss of coolant indicates there is a leak in the cooling system and we recommend that the system be checked by an authorized HYUNDAI dealer.
- When the engine overheats from low engine coolant,suddenly adding engine coolant may cause cracks in the engine. To prevent damage, add engine coolant slowly in small quantities.

### IF YOU HAVE A FLAT TIRE (WITH SPARE TIRE, IF EQUIPPED)



#### Jacking instructions

The jack is provided for emergency tire changing only.

To prevent the jack from "rattling" while the vehicle is in motion, store it properly and fasten the jack screw fully.

Follow jacking instructions to reduce the possibility of personal injury.

### A WARNING - Changing tires

- Never attempt vehicle repairs in the traffic lanes of a public road or highway.
- Always move the vehicle completely off the road and onto the shoulder before trying to change a tire. The jack should be used on firm level ground. If you cannot find a firm level place off the road, call a towing service company for assistance.
- Be sure to use the correct front and rear jacking positions on the vehicle; never use the bumpers or any other part of the vehicle for jacking support.

(Continued)

#### Jack and tools

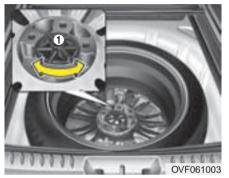
The jack, jack handle, wheel lug nut wrench are stored in the luggage compartment.

Pull up the luggage box cover to reach this equipment.

- (1) Jack handle
- (2) Jack
- (3) Wheel lug nut wrench

#### (Continued)

- The vehicle can easily roll off the jack causing serious injury or death.
- Do not get under a vehicle that is supported by a jack.
- Do not start or run the engine while the vehicle is on the jack.
- Do not allow anyone to remain in the vehicle while it is on the jack.
- Make sure any children present are in a secure place away from the road and from the vehicle to be raised with the jack.



Removing and storing the spare tire

Turn the tire hold-down wing bolt (1) counterclockwise.

Store the tire in the reverse order of removal.

To prevent the spare tire and tools from "rattling" while the vehicle is in motion, store them properly.



#### **Changing tires**

- 1. Park on a level surface and apply the parking brake firmly.
- 2. Shift the shift lever into R (Reverse) with manual transaxle or P (Park) with dual clutch transmission.
- 3. Activate the hazard warning flasher.



OVF068004

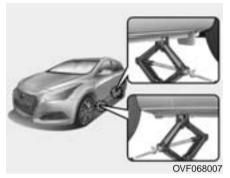
- 4. Remove the wheel lug nut wrench, jack, jack handle, and spare tire from the vehicle.
- 5. Block both the front and rear of the wheel that is diagonally opposite the jack position.

### A WARNING - Changing a tire

- To prevent vehicle movement while changing a tire, always set the parking brake fully, and always block the wheel diagonally opposite the wheel being changed.
- We recommend that the wheels of the vehicle be chocked, and that no person remain in a vehicle that is being jacked.



 Loosen the wheel lug nuts counterclockwise one turn each, but do not remove any nut until the tire has been raised off the ground.





7. Place the jack at the front or rear jacking position closest to the tire you are changing. Place the jack at the designated locations under the frame. The jacking positions are plates welded to the frame with two tabs and a raised dot to index with the jack.

A WARNING - Jack location To reduce the possibility of injury, be sure to use only the iack provided with the vehicle and in the correct jack position; never use any other part of the vehicle for jack support.

- 8. Insert the jack handle into the jack and turn it clockwise, raising the vehicle until the tire just clears the ground. This measurement is approximately 30 mm (1.2 in). Before removing the wheel lug nuts, make sure the vehicle is stable and that there is no chance for movement or slippage.
- 9. Loosen the wheel nuts and remove them with your fingers. Slide the wheel off the stude and lav it flat so it cannot roll away. To put the wheel on the hub, pick up the spare tire, line up the holes with the studs and slide the wheel onto them. If this is difficult, tip the wheel slightly and get the top hole in the wheel lined up with the top stud. Then jiggle the wheel back and forth until the wheel can be slid over the other studs

### A WARNING

- Wheels and wheel covers may have sharp edges. Handle them carefully to avoid possible severe injury.
- Before putting the wheel into place, be sure that there is nothing on the hub or wheel (such as mud, tar, gravel, etc.) that interferes with the wheel from fitting solidly against the hub. If there is, remove it. If the contact of the mounting surface between the wheel and hub is not good, the wheel nuts could come loose and cause loss of a wheel, Loss of a wheel may result in losing control of the vehicle. This may cause serious injury or death.
- 10. To reinstall the wheel, hold it on the studs, put the wheel nuts on the studs and tighten them finger tight. The nuts should be installed with their tapered small diameter ends directed inward. Jiggle the tire to be sure it is completely seated, then tighten the nuts as much as possible with your fingers again.
- 11. Lower the vehicle to the ground by turning the wheel nut wrench counterclockwise.



Then position the wrench as shown in the drawing and tighten the wheel nuts. Be sure the socket is seated completely over the nut. Do not stand on the wrench handle or use an extension pipe over the wrench handle. Go around the wheel tightening every nut following the numerical sequence shown in the image until they are all tight. Then double-check each nut for tightness. After changing wheels, we recommend that the system be checked by an authorized HYUNDAI dealer.

#### Wheel nut tightening torque:

Steel wheel & aluminium alloy wheel: 11~13 kgf•m (79~94 lbf•ft)

If you have a tire gauge, remove the valve cap and check the air pressure. If the pressure is lower than recommended, drive slowly to the nearest service station and inflate to the correct pressure. If it is too high, adjust it until it is correct. Always reinstall the valve cap after checking or adjusting tire pressure. If the cap is not replaced, air may leak from the tire. If you lose a valve cap, buy another and install it as soon as possible.

After you have changed wheels, always secure the flat tire in its place and return the jack and tools to their proper storage locations.

### ! CAUTION

Your vehicle has metric threads on the wheel studs and nuts. Make certain during wheel removal that the same nuts that were removed are reinstalled or, if replaced, that nuts with metric threads and the same chamfer configuration are used. Installation of a non-metric thread nut on a metric stud or vice-versa will not secure the wheel to the hub properly and will damage the stud so that it must be replaced.

Note that most lug nuts do not have metric threads. Be sure to use extreme care in checking for thread style before installing aftermarket lug nuts or wheels.

*If in doubt, we recommend that you consult an authorized HYUNDAI dealer.* 

A WARNING - Wheel studs If the studs are damaged, they may lose their ability to retain the wheel. This could lead to the loss of the wheel and a collision resulting in serious injuries.

To prevent the jack, jack handle, wheel lug nut wrench and spare tire from rattling while the vehicle is in motion, store them properly.

## A WARNING - Inadequate spare tire pressure

Check the inflation pressures as soon as possible after installing the spare tire. Adjust it to the specified pressure, if necessary. Refer to "Tires and wheels" in section 8.

## Important - use of compact spare tire (if equipped)

Your vehicle is equipped with a compact spare tire. This compact spare tire takes up less space than a regular-size tire. This tire is smaller than a conventional tire and is designed for temporary use only.

### ! CAUTION

- You should drive carefully when the compact spare is in use. The compact spare should be replaced by the proper conventional tire and rim at the first opportunity.
- The operation of this vehicle is not recommended with more than one compact spare tire in use at the same time.

### **A** WARNING

The compact spare tire is for emergency use only. Do not operate your vehicle on this compact spare at the speed over 80 km/h (50 mph). The original tire should be repaired or replaced as soon as possible to avoid failure of the spare possibly leading to personal injury or death.

The compact spare should be inflated to 420 kPa (60 psi).

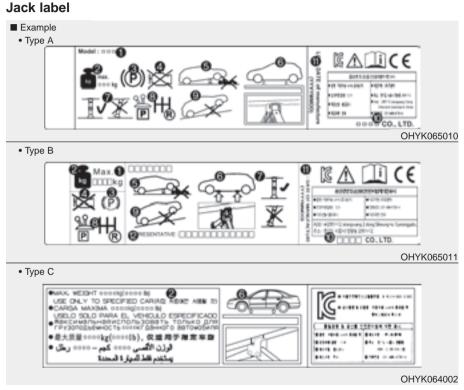
### **\* NOTICE**

Check the inflation pressure after installing the spare tire. Adjust it to the specified pressure, as necessary. When using a compact spare tire, observe the following precautions:

- Under no circumstances should you exceed 80 km/h (50 mph); a higher speed could damage the tire.
- Ensure that you drive slowly enough to avoid all hazards. Any road hazard, such as a pothole or debris, could seriously damage the compact spare.
- Any continuous road use of this tire could result in tire failure, loss of vehicle control, and possible personal injury.
- Do not exceed the vehicle's maximum load rating or the load-carrying capacity shown on the sidewall of the compact spare tire.
- Avoid driving over obstacles. The compact spare tire diameter is smaller than the diameter of a conventional tire and reduces the ground clearance approximately 25 mm (1 inch), which could result in damage to the vehicle.

- Do not take this vehicle through an automatic car wash while the compact spare tire is installed.
- Do not use tire chains on the compact spare tire. Because of the smaller size, a tire chain will not fit properly. This could damage the vehicle and result in loss of the chain.
- The compact spare tire should not be installed on the front axle if the vehicle must be driven in snow or on ice.
- Do not use the compact spare tire on any other vehicle because this tire has been designed especially for your vehicle.
- The compact spare tire's tread life is shorter than a regular tire. Inspect your compact spare tire regularly and replace worn compact spare tires with the same size and design, mounted on the same wheel.

- The compact spare tire should not be used on any other wheels, nor should standard tires, snow tires, wheel covers or trim rings be used with the compact spare wheel. If such use is attempted, damage to these items or other car components may occur.
- Do not use more than one compact spare tire at a time.
- Do not tow a trailer while the compact spare tire is installed.



\* The actual Jack label in the vehicle may differ from the illustration. For more detailed specifications, refer to the label attached to the jack.

- 1. Model Name
- 2. Maximum allowable load
- 3. When using the jack, set your parking brake.
- 4. When using the jack, stop the engine.
- 5. Do not get under a vehicle that is supported by a jack.
- 6. The designated locations under the frame
- 7. When supporting the vehicle, the base plate of jack must be vertical under the lifting point.
- 8. Shift into Reverse gear on vehicles with manual transaxle or move the shift lever to the P position on vehicles with dual clutch transmission.
- 9. The jack should be used on firm level ground.
- 10. Jack manufacture
- 11. Production date
- 12. Representative company and address

### EC Declaration of Conformity for Jack

CE	
	PC D. J
	EC Declaration of Conformity ing to EC Machinery Directive 2006/42/EC
actors	ing is i.e. summing oregane associate.
THE BARRO NO. CO.	178
# 22, Harman 3-Gil, Bank	
	responsibility that the product
1000	
	Just Assembly
other meethodeneets)	Jack Assembly 800kg, Jack Assembly 700kg
	Jack Assembly Willing, Jack Assembly 100kg Jack Assembly 120kg, Jack Assembly 100kg
Security Inc.	sick Assessibly (2004g, Seck Assessibly (2004g
Taur of Bandachura	
	and the second s
Anomentic .	
EN BOILINE	Safety of machinesy - Deneral principles for design - Roll assessment
12010	and fun metallion
ON INCOMPOSITION - DIAL	Salety of muchanery - Basic concepts, general proceptes for design. Pa
(2008)	2 Technical principles
the talenar	Multip or movable jacks and associated Ming equipment
(2004)	
National distance	
	sches on the approximation of the laws of Member States relating t advancy (CUL157 Jun 3, 2006)
10	
Ubit.Semi.M.B.	201 Handlet, On Pander -
Place and sole of sour	come and significe or equivalent making of authorized persons
* 1 CF Compiling Price	Subset Liabled (Europian Notfled bol) : 3474 (
	Statut Carage, Station, Komering Northann, VN11-803, England

JACKDOC14S

### TIRE PRESSURE MONITORING SYSTEM (TPMS)



- (1) Low tire pressure telltale / TPMS malfunction indicator
  (2) Low tire pressure position telltale
- (Shown on the LCD display)

Each tire, including the spare (if provided), should be checked monthly when cold and inflated to the inflation pressure recommended by the vehicle manufacturer on the vehicle placard or tire inflation pressure label. (If your vehicle has tires of a different size than the size indicated on the vehicle placard or tire inflation pressure label, you should determine the proper tire inflation pressure for those tires.)

As an added safety feature, your vehicle has been equipped with a tire pressure monitoring system (TPMS) that illuminates a low tire pressure telltale when one or more of your tires is significantly under-inflated. Accordingly, when the low tire pressure telltale illuminates, you should stop and check your tires as soon as possible, and inflate them to the proper pressure. Driving on a significantly under-inflated tire causes the tire to overheat and can lead to tire failure. Under-inflation also reduces fuel efficiency and tire tread life, and may affect the vehicle's handling and stopping ability.

Please note that the TPMS is not a substitute for proper tire maintenance, and it is the driver's responsibility to maintain correct tire pressure, even if under-inflation has not reached the level to trigger illumination of the TPMS low tire pressure telltale.

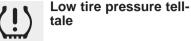
Your vehicle has also been equipped with a TPMS malfunction indicator to indicate when the system is not operating properly. The TPMS malfunction indicator is combined with the low tire pressure telltale. When the system detects a malfunction. the telltale will flash for approximately 1 minute and then remain continuously illuminated. This sequence will continue upon subsequent vehicle start-ups as long as the malfunction exists. When the TPMS malfunction indicator remains illuminated after blinking for approximately 1 minute, the system may not be able to detect or signal low tire pressure as intended.

TPMS malfunctions may occur for a variety of reasons, including the installation of replacement or alternate tires or wheels on the vehicle that prevent the TPMS from functioning properly. Always check the TPMS malfunction telltale after replacing one or more tires or wheels on your vehicle to ensure that the replacement or alternate tires and wheels allow the TPMS to continue to function properly.

### **\* NOTICE**

If any of the below happens, we recommend that the system be checked by an authorized HYUNDAI dealer. 1. The low tire pressure telltale/ TPMS malfunction indicator do not illuminate for 3 seconds when the ignition switch is turned to the ON position or engine is running.

- 2. The TPMS malfunction indicator remains illuminated after blinking for approximately 1 minute.
- 3. The Low tire pressure position telltale remains illuminated





### Low tire pressure position telltale

When the tire pressure monitoring system warning indicators are illuminated, one or more of your tires is significantly under-inflated. The low tire pressure position telltale light will indicate which tire is significantly under-inflated by illuminating the corresponding position light.

If either telltale illuminates, immediately reduce your speed, avoid hard cornering and anticipate increased stopping distances. You should stop and check your tires as soon as possible. Inflate the tires to the proper pressure as indicated on the vehicle's placard or tire inflation pressure label located on the driver's side center pillar outer panel. If you cannot reach a service station or if the tire cannot hold the newly added air, replace the low pressure tire with a spare tire.

After you replace the low pressure tire with the spare tire, one of the following will happen:

- The TPMS malfunction indicator may blink for approximately 1 minute and then remain continuously illuminated because the TPMS sensor is not mounted on the spare wheel. (changed tire equipped with a sensor not in the vehicle)
- The TPMS malfunction indicator will remain continuously illuminated while driving because the TPMS sensor is not mounted on the spare wheel, (changed tire equipped with a sensor in the vehicle)

### ! CAUTION

In winter or cold weather, the low tire pressure telltale may illuminate if the tire pressure was adjusted to the recommended tire inflation pressure in warm weather. It does not mean your TPMS is malfunctioning because the decreased temperature leads to a proportional lowering of tire pressure.

When you drive your vehicle from a warm area to a cold area or from a cold area to a warm area, or the outside temperature is greatly higher or lower, you should check the tire inflation pressure and adjust the tires to the recommended tire inflation pressure.

# WARNING - Low pressure damage

Significantly low tire pressure makes the vehicle unstable and can contribute to loss of vehicle control and increased braking distances.

Continued driving on low pressure tires can cause the tires to overheat and fail.



#### TPMS (Tire Pressure Monitoring System) malfunction indicator

The TPMS malfunction indicator will illuminate after it blinks for approximately one minute when there is a problem with the Tire Pressure Monitoring System. If the system is able to correctly detect an under inflation warning at the same time as system failure then the TPMS malfunction indicator remains illuminated after blinking for approximately 1 minute and the low tire pressure position telltale will illuminate e.g. if Front Left sensor fails, the TPMS malfunction indicator remains illuminated after blinking for approximately 1 minute, but if the Front Right, Rear Left, or Rear Right tire is under-inflated, the low tire pressure position telltales may illuminate together with the TPMS malfunction indicator.

We recommend that the system be checked by an authorized HYUNDAI dealer to determine the cause of the problem.

### **CAUTION**

- The TPMS malfunction indicator may blink for approximately 1 minute and then remain continuously illuminated if the vehicle is moving around electric power supply cables or radios transmitter such as at police stations, government and public offices, broadcasting stations, military installations, airports, or transmitting towers, etc. This can interfere with normal operation of the Tire Pressure Monitoring System (TPMS).
- The TPMS malfunction indicator may blink for approximately 1 minute and then remain continuously illuminated if snow chains are used or some separate electronic devices such as notebook computer, mobile charger, remote starter or navigation etc., are used in the vehicle. This can interfere with normal operation of the Tire Pressure Monitoring System (TPMS).

#### Changing a tire with TPMS

If you have a flat tire, the low Tire Pressure and Position telltales will come on. We recommend that the system be checked by an authorized HYUNDAI dealer.

#### ! CAUTION

It is recommended that you do not use a puncture-repairing agent not approved by HYUNDAI dealer to repair and/or inflate a low pressure tire. Tire sealant not approved by HYUNDAI dealer may damage the tire pressure sensor.

Each wheel is equipped with a tire pressure sensor mounted inside the tire behind the valve stem. You must use TPMS specific wheels. It is recommended that you have your tires serviced by an authorized HYUNDAI dealer. After you replace the low pressure tire with the spare tire, one of the following will happen:

- The TPMS malfunction indicator may blink for approximately 1 minute and then remain continuously illuminated because the TPMS sensor is not mounted on the spare wheel. (changed tire equipped with a sensor not in the vehicle)
- The TPMS malfunction indicator will remain continuously illuminated while driving because the TPMS sensor is not mounted on the spare wheel. (changed tire equipped with a sensor in the vehicle)

You may not be able identify a low tire by simply looking at it. Always use a good quality tire pressure gauge to measure the tire's inflation pressure. Please note that a tire that is hot (from being driven) will have a higher pressure measurement than a tire that is cold (from sitting stationary for at least 3 hours and driven less than 1 mile (1.6 km) during that 3 hour period).

Allow the tire to cool before measuring the inflation pressure. Always be sure the tire is cold before inflating to the recommended pressure.

A cold tire means the vehicle has been sitting for 3 hours and driven for less than 1 mile (1.6 km) in that 3 hour period.

### ! CAUTION

We recommend that you use the sealant approved by HYUNDAI if your vehicle is equipped with a Tire Pressure Monitoring System. The liquid sealant can damage the tire pressure sensors.

### A WARNING - TPMS

- The TPMS cannot alert you to severe and sudden tire damage caused by external factors such as nails or road debris.
- If you feel any vehicle instability, immediately take your foot off the accelerator, apply the brakes gradually and with light force, and slowly move to a safe position off the road.

#### A WARNING - Protecting TPMS

Tampering with, modifying, or disabling the Tire Pressure Monitoring System (TPMS) components may interfere with the system's ability to warn the driver of low tire pressure conditions and/or TPMS malfunctions. Tampering with, modifying, or disabling the Tire Pressure Monitoring System (TPMS) components may void the warranty for that portion of the vehicle.

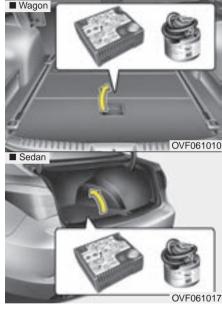
### **A WARNING** - For EUROPE

- Do not modify the vehicle, it may interfere with the TPMS function.
- The wheels on the market do not have a TPMS sensor.

For your safety, we recommend that you use parts for replacement from an authorized HYUNDAI dealer.

- If you use the wheels on the market, use a TPMS sensor approved by a HYUNDAI dealer.
- If your vehicle is not equipped with a TPMS sensor or TPMS does not work properly, you may fail the periodic vehicle inspection conducted in your country.
- \* All vehicles sold in the EUROPE market during below period must be equipped with TPMS.
  - New model vehicle : Nov. 1, 2012 ~
  - Current model vehicle : Nov. 1, 2014~ (Based on vehicle registrations)

### IF YOU HAVE A FLAT TIRE (WITH TIREMOBILITYKIT, IF EQUIPPED) -TYPE A



Please read the instructions before using the TireMobilityKit.

- (1) Compressor
- (2) Sealant bottle



### Introduction

With the TireMobilityKit you stay mobile even after experiencing a tire puncture.

The system of compressor and sealing compound effectively and comfortably seals most punctures in a passenger car tire caused by nails or similar objects and reinflates the tire.

After you ensured that the tire is properly sealed you can drive cautiously on the tire (up to 200 km (120 miles)) at a max. speed of 80 km/h (50 mph) in order to reach a vehicle or tire dealer to have the tire replaced.

It is possible that some tires, especially with larger punctures or damage to the sidewall, cannot be sealed completely. Air pressure loss in the tire may adversely affect tire performance.

For this reason, you should avoid abrupt steering or other driving maneuvers, especially if the vehicle is heavily loaded or if a trailer is in use.

The TireMobilityKit is not designed or intended as a permanent tire repair method and is to be used for one tire only.

This instruction shows you step by step how to temporarily seal the puncture simply and reliably.

Read the section "Notes on the safe use of the TireMobilityKit".

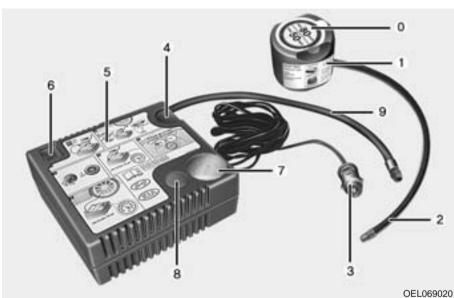
### A WARNING

Do not use the TireMobilityKit if a tire is severely damaged by driving run flat or with insufficient air pressure.

Only punctured areas located within the tread region of the tire can be sealed using the TireMobilityKit.

Damage to the sidewall must not be repaired due to safety reasons.

### Components of the TireMobilityKit



- 0. Speed restriction label
- 1. Sealant bottle and label with speed restriction
- 2. Filling hose from sealant bottle to wheel
- 3. Connectors and cable for the power outlet direct connection
- 4. Holder for the sealant bottle
- 5. Compressor
- 6. On/off switch
- 7. Pressure gauge for displaying the tire inflation pressure

- 8. Button for reducing tire inflation pressure
- 9. Hose to connect compressor and sealant bottle or compressor and wheel

Connectors, cable and connection hose are stored in the compressor housing.

### **A** WARNING

- Before using the TireMobilityKit, follow the instructions on the sealant bottle.
- Remove the label with the speed restriction from the sealant bottle and apply it to the steering wheel.
- Please note the expiry date on the sealant bottle.

### Using the TireMobilityKit

1. Filling the sealant

Strictly follow the specified sequence, otherwise the sealant may escape under high pressure.

- 1) Shake the sealant bottle.
- 2) Screw connection hose 9 onto the connector of the sealant bottle.
- 3) Ensure that button 8 on the compressor is not pressed.
- 4) Unscrew the valve cap from the valve of the defective wheel and screw filling hose 2 of the sealant bottle onto the valve.

### ! CAUTION



Securely install the sealant filling hose to the valve. If not, sealant may flow backward, possibly clogging the filling hose.



5) Insert the sealant bottle into the housing of the compressor so that the bottle is upright.

- 6) Ensure that the compressor is switched off, position 0.
- 7) Connect between compressor and the vehicle power outlet using the cable and connectors.

8) With the ignition switched on:

Switch on the compressor and let it run for approximately 3 minutes to fill the sealant. The inflation pressure of the tire after filling is unimportant. 9) Switch off the compressor.

10) Detach the hoses from the sealant bottle connector and from the tire valve.

Return the TireMobilityKit to its storage location in the vehicle.

## A WARNING

Carbon monoxide poisoning and suffocation is possible if the engine is left running in a poorly ventilated or unventilated location (such as inside a building).

#### Distributing the sealant

Immediately drive approximately 3 km (2 miles) to evenly distribute the sealant in the tire.

### .! CAUTION

Do not exceed a speed of 80 km/h (50 mph). If possible, do not fall below a speed of 20 km/h (12 mph).

While driving, if you experience any unusual vibration, ride disturbance or noise, reduce your speed and drive with caution until you can safely pull off of the side of the road.

Call for road side service or towing.

## Producing the tire inflation pressure

- 1) After driving approximately 3 km (2 miles), stop at a suitable location.
- 2) Connect connection hose 9 of the compressor directly to the tire valve.
- 3) Connect between compressor and the vehicle power outlet using the cable and connectors.
- Adjust the tire inflation pressure to the recommended tire pressure in section 8. With the ignition switched on, proceed as follows.
  - To increase the inflation pressure: Switch on the compressor, position I. To check the current inflation pressure setting, briefly switch off the compressor.

### A WARNING

Do not let the compressor run for more than 10 minutes, otherwise the device will overheat and may be damaged. - To reduce the inflation pressure: Press the button 8 on the compressor.

## .! CAUTION

If the inflation pressure is not maintained, drive the vehicle a second time, refer to Distributing the sealant. Then repeat steps 1 to 4.

Use of the TireMobilityKit may be ineffectual for tire damage larger than approximately 4 mm (0.16 in).

We recommend that you contact an authorized HYUNDAI dealer if the tire cannot be made roadworthy with the Tire Mobility Kit.

# A WARNING

The tire inflation pressure must be at least 200 kPa (29 psi). If it is not, do not continue driving. Call for road side service or towing.

# Notes on the safe use of the TireMobilityKit

- Park your car at the side of the road so that you can work with the TireMobilityKit away from moving traffic. Place your warning triangle in a prominent place to make passing vehicles aware of your location.
- To be sure your vehicle won't move, even when you're on fairly level ground, always set your parking brake.
- Only use the TireMobilityKit for sealing/inflation passenger car tires. Do not use on motorcycles, bicycles or any other type of tires.
- Do not remove any foreign objectssuch as nails or screws -that have penetrated the tire.
- Before using the TireMobilityKit, read the precautionary advice printed on the sealant bottle!
- Provided the car is outdoors, leave the engine running. Otherwise operating the compressor may eventually drain the car battery.

- Never leave the TireMobilityKit unattended while it is being used.
- Do not leave the compressor running for more than 10 min. at a time or it may overheat.
- Do not use the TireMobilityKit if the ambient temperature is below 30°C (-22°F).
- Do not use the sealing compound after its expiration date which can be found on the label of the bottle.
- Keep away from children.

## ! CAUTION

The Tire Mobility Kit is a temporary fix to the tire and we recommend that the tire should be inspected by an authorized HYUNDAI dealer as soon as possible.

# A WARNING

Have your tire repaired as soon as possible. The tire may loose air pressure at any time after inflating with the TMK.

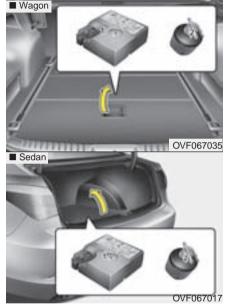
## ! CAUTION -TPMS

(if equipped) When using Tire Mobility Kit, the tire sealant can damage the tire pressure sensor. After using the Tire Mobility Kit, we recommend that the tire pressure sensor should be checked by an authorized HYUNDAI dealer.

## **\* NOTICE**

Sealing compound and spare parts can be obtained and replaced at an authorized vehicle or tire dealer. Empty sealing compound bottles may be disposed of at home. Liquid residue from the sealing compound should be disposed of by your vehicle or tire dealer or in accordance with local waste disposal regulations.

# IF YOU HAVE A FLAT TIRE (WITH TIRE MOBILITY KIT, IF EQUIPPED) - TYPE B



For safe operation, carefully read and follow the instructions in this manual before use.

- (1) Compressor
- (2) Sealant bottle

The Tire Mobility Kit is a temporary fix to the tire and we recommend that the system be inspected by an authorized HYUNDAI dealer.

# ! CAUTION

When two or more tires are flat, do not use the tire mobility kit because the supported one sealant of Tire Mobility Kit is only used for one flat tire.

# A WARNING

Do not use the Tire Mobility Kit to repair punctures in the tire walls. This can result in an accident due to tire failure.

# **A** WARNING

Have your tire repaired as soon as possible. The tire may loose air pressure at any time after inflating with the Tire Mobility Kit.

## Introduction

With the Tire Mobility Kit you stay mobile even after experiencing a tire puncture.

The system of compressor and sealing compound effectively and comfortably seals most punctures in a passenger car tire caused by nails or similar objects and reinflates the tire.

After you ensured that the tire is properly sealed you can drive cautiously on the tire (distance up to 200 km (120 miles)) at a max. speed of 80 km/h (50 mph) in order to reach a service station or tire dealer to have the tire replaced.

It is possible that some tires, especially with larger punctures or damage to the sidewall, cannot be sealed completely.

Air pressure loss in the tire may adversely affect tire performance.

For this reason, you should avoid abrupt steering or other driving maneuvers, especially if the vehicle is heavily loaded or if a trailer is in use. The Tire Mobility Kit is not designed or intended as a permanent tire repair method and is to be used for one tire only. This instruction shows you step by step how to temporarily seal the puncture simply and reliably.

Read the section "Notes on the safe use of the Tire Mobility Kit".

# A WARNING

Do not use the TMK if a tire is severely damaged by driving run flat or with insufficient air pressure. Only punctured areas located within the tread region of the tire can be sealed using the TMK.

## Notes on the safe use of the Tire Mobility Kit

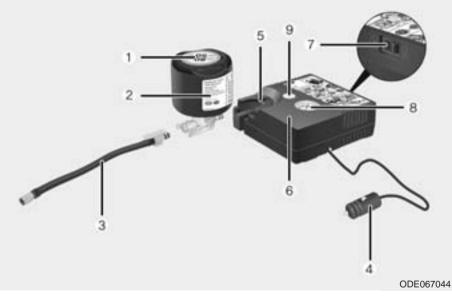
- Park your car at the side of the road so that you can work with the Tire Mobility Kit away from moving traffic.
- To be sure your vehicle will not move, even when you're on fairly level ground, always set your parking brake.
- Only use the Tire Mobility Kit for sealing/inflation passenger car tires. Only punctured areas located within the tread region of the tire can be sealed using the tire mobility kit.
- Do not use on motorcycles, bicycles or any other type of tires.
- When the tire and wheel are damaged, do not use Tire Mobility Kit for your safety.
- Use of the Tire Mobility Kit may not be effective for tire damage larger than approximately 6 mm (0.24 in).

If the tire cannot be made roadworthy with the Tire Mobility Kit, we recommend that you contact an authorized HYUNDAI dealer.

- Do not use the Tire Mobility Kit if a tire is severely damaged by driving run flat or with insufficient air pressure.
- Do not remove any foreign objects such as nails or screws that have penetrated the tire.

- Provided the car is outdoors, leave the engine running. Otherwise operating the compressor may eventually drain the car battery.
- Never leave the Tire Mobility Kit unattended while it is being used.
- Do not leave the compressor running for more than 10 min. at a time or it may overheat.
- Do not use the Tire Mobility Kit if the ambient temperature is below -30°C (-22°F).
- In case of skin contact with the sealant, wash the area thoroughly with plenty of water. If the irritation persists, seek medical attention.
- In case of eye contact with the sealant, flush your eyes for at least 15 minutes. If the irritation persists, seek medical attention.
- In case of swallowing the sealant, rinse the mouth and drink plenty of water. However, never give anything to an unconscious person and seek medical attention immediately.
- Long time exposure to the sealant may cause damage to bodily tissue such as kidney, etc.

### **Components of the Tire Mobility Kit**



- 1. Speed-restriction label
- 2. Sealant bottle and label with speed restriction
- 3. Filling hose from sealant bottle to wheel
- 4. Connectors and cable for the power outlet direct connection
- 5. Holder for the sealant bottle
- 6. Compressor
- 7. ON/OFF switch
- 8. Pressure gauge for displaying the tire inflation pressure
- 9. Button for reducing the tire inflation pressure

Connectors, cable and connection hose are stored in the compressor housing. Strictly follow the specified sequence, otherwise the sealant may escape under high pressure.

A WARNING - Expired sealant Do not use the Tire sealant after the sealant has expired (i.e. pasted the expiration date on the sealant container). This can increase the risk of tire failure.

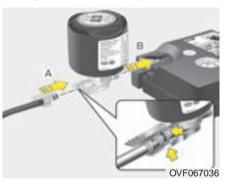
## A WARNING - Sealant

- Keep out of reach of children.
- Avoid contact with eyes.
- Do not swallow.

.! CAUTION



Detach the speed restriction label (1) from the sealant bottle (2), and place it in a highly visible place inside the vehicle such as on the steering wheel to remind the driver not to drive too fast. Using the Tire Mobility Kit



- 1. Shake the sealant bottle (2).
- Connect the filling hose (3) to the sealant bottle (2) in the direction of (A) and connect the sealant bottle to the compressor (6) in the direction of (B).
- 3. Ensure that the compressor is switched OFF.



4. Unscrew the valve cap from the valve of the defective wheel and screw the filling hose (3) of the sealant bottle onto the valve.

# ! CAUTION



Securely install the sealant filling hose to the valve. If not, sealant may flow backward, possibly clogging the filling hose.



- 5. Plug the compressor power cord (4) into the vehicle power outlet.
- With the ignition switch in the ON position, switch on the compressor and let it run for approximately 5~7 minutes to fill the sealant up to proper pressure. (refer to the Tire and Wheels, chapter 8). The inflation pressure of the tire after filling is unimportant and will be checked/corrected later.

Be careful not to overinflate the tire and stay away from the tire when filling it.

! CAUTION - Tire pressure Do not attempt to drive your vehicle if the tire pressure is below 200 kPa (29 psi). This could result in an accident due to sudden tire failure.

- 7. Switch off the compressor.
- Detach the hoses from the sealant bottle connector and from the tire valve.
   Return the Tire Mobility Kit to its storage

location in the vehicle.

## WARNING - Carbon monoxide

Do not leave your vehicle running in a poorly ventilated area for extended periods of time. Carbon monoxide poisoning and suffocation can occur.



OVF067037

### Distributing the sealant

Immediately drive approximately 7~10 km (4~6 miles or, about 10min) to evenly distribute the sealant in the tire.
 Do not exceed a speed of 80 km/h (50 mph). If possible, do not fall below a speed of 20 km/h (12 mph).

While driving, if you experience any unusual vibration, ride disturbance or noise, reduce your speed and drive with caution until you can safely pull off of the side of the road.

Call for road side service or towing. When you use the Tire Mobility Kit, the tire pressure sensors and wheel may be damaged by sealant, remove the sealant stained with tire pressure sensors and wheel and inspect in authorized dealer.



OVF068031

## Checking the tire inflation pressure

- 1. After driving approximately 7~10 km (4~6 miles or about 10 min), stop at a safety location.
- 2. Connect the filling hose (3) of the compressor directly to the tire valve.

- 3. Plug the compressor power cord into the vehicle power outlet.
- 4. Adjust the tire inflation pressure to the recomended tire inflation.

With the ignition swithched on, proceed as follows.

- To increase the inflation pressure : Switch on the compressor. To check the current inflation pressure setting, briefly switch off the compressor.
- To reduce the inflation pressure: Press the button (9) on the compressor.

## **\* NOTICE**

Do not let the compressor run for more than 10 minutes, otherwise the device will overheat and may be damaged.

## **\* NOTICE**

The pressure gauge may show higher than actual reading when the compressor is running. To get an accurate tire reading, the compressor needs to be turned off.

# ! CAUTION

If the inflation pressure is not maintained, drive the vehicle a second time, refer to Distributing the sealant. Then repeat steps 1 to 4. Use of the TMK may be ineffectual for tire damage larger than approximately 4 mm (0.16 in).

We recommend that you contact an authorized HYUNDAI dealer if the tire cannot be made roadworthy with the Tire Mobility Kit.

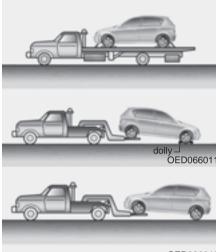
# .! CAUTION - Tire pressure sensor

The sealant on the tire pressure sensor and wheel should be removed when you replace the tire with a new one and inspect the tire pressure sensors at an authorized dealer. When reinstalling the repaired or replaced tire and wheel on the vehicle, tighten the wheel lug nut to 11~13 kgf·m (79~94 lbf·ft).

# A WARNING

The tire inflation pressure must be at least 220 kPa (32 psi). If it is not, do not continue driving. Call for road side service or towing.

# TOWING



It is acceptable to tow the vehicle with the rear wheels on the ground (without dollies) and the front wheels off the ground. If any of the loaded wheels or suspension components are damaged or the vehicle is being towed with the front wheels on the ground, use a towing dolly under the front wheels.

When being towed by a commercial tow truck and wheel dollies are not used, the front of the vehicle should always be lifted, not the rear.

# **\* NOTICE**

If the EPB does not release normally, we recommend that the system be checked by an authorized HYUNDAI dealer.





# ! CAUTION

- Do not tow the vehicle backwards with the front wheels on the ground as this may cause damage to the vehicle.
- Do not tow with sling-type equipment. Use wheel lift or flatbed equipment.

OED066012

## **Towing service**

If emergency towing is necessary, we recommend having it done by an authorized HYUNDAI dealer or a commercial tow-truck service. Proper lifting and towing procedures are necessary to prevent damage to the vehicle. The use of wheel dollies or flatbed is recommended.

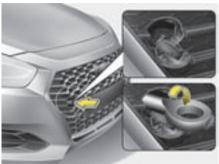
For trailer towing guidelines information, refer to "Trailer towing" in section 5.

When towing your vehicle in an emergency without wheel dollies :

- 1. Set the ignition switch in the ACC position.
- 2. Place the transaxle shift lever in N (Neutral).
- 3. Release the parking brake.

# **!** CAUTION

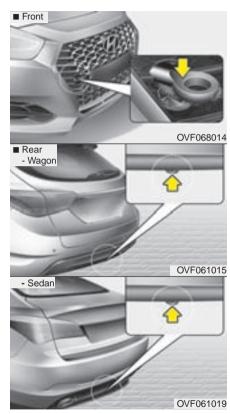
Failure to place the transaxle shift lever in N (Neutral) may cause internal damage to the transaxle.



OVF068013

# Removable towing hook (if equipped)

- 1. Open the tailgate/trunk, and remove the towing hook from the tool case.
- 2. Remove the hole cover by pressing the lower part of the hole cover on the front bumper.
- 3. Install the towing hook by turning it clockwise into the hole until it is fully secured.
- 4. Remove the towing hook and install the cover after use.



**Emergency towing** 

#### If towing is necessary, we recommend you to have it done by an authorized HYUNDAI dealer or a commercial tow truck service.

If towing service is not available in an emergency, your vehicle may be temporarily towed using a cable or chain secured to the emergency towing hook under the front (or rear) of the vehicle. Use extreme caution when towing the vehicle. A driver must be in the vehicle to steer it and operate the brakes.

Towing in this manner may be done only on hard-surfaced roads for a short distance and at low speed. Also, the wheels, axles, power train, steering and brakes must all be in good condition.

- Do not use the towing hooks to pull a vehicle out of mud, sand or other conditions from which the vehicle cannot be driven out under its own power.
- Avoid towing a vehicle heavier than the vehicle doing the towing.
- The drivers of both vehicles should communicate with each other frequently.

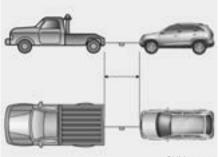
# ! CAUTION

- Attach a towing strap to the tow hook.
- Using a portion of the vehicle other than the tow hooks for towing may damage the body of your vehicle.
- Use only a cable or chain specifically intended for use in towing vehicles. Securely fasten the cable or chain to the towing hook provided.
- Before emergency towing, check that the hook is not broken or damaged.
- Fasten the towing cable or chain securely to the hook.
- Do not jerk the hook. Apply steady and even force.
- To avoid damaging the hook, do not pull from the side or at a vertical angle. Always pull straight ahead.

# A WARNING

Use extreme caution when towing the vehicle.

- Avoid sudden starts or erratic driving maneuvers which would place excessive stress on the emergency towing hook and towing cable or chain. The hook and towing cable or chain may break and cause serious injury or damage.
- If the disabled vehicle is unable to be moved, do not forcibly continue the towing. We recommend that you contact an authorized HYUNDAI dealer or a commercial tow truck service for assistance.
- Tow the vehicle as straight ahead as possible.
- Keep away from the vehicle during towing.



OXM069009

- Use a towing strap less than 5 m (16 feet) long. Attach a white or red cloth (about 30 cm (12 inches) wide) in the middle of the strap for easy visibility.
- Drive carefully so that the towing strap is not loosened during towing.

#### Emergency towing precautions

- Turn the ignition switch to ACC so the steering wheel isn't locked.
- Place the transaxle shift lever in N (Neutral).
- Release the parking brake.
- Depress the brake pedal with more force than normal since you will have reduced brake performance.
- More steering effort will be required because the power steering system will be disabled.
- If you are driving down a long hill, the brakes may overheat and brake performance will be reduced. Stop often and let the brakes cool off.

# ! CAUTION

- Dual clutch transmission
- If the car is being towed with all four wheels on the ground, it can be towed only from the front. Be sure that the transaxle is in neutral. Be sure the steering is unlocked by placing the ignition switch in the ACC position. A driver must be in the towed vehicle to operate the steering and brakes.
- To avoid serious damage to the dual clutch transmission, limit the vehicle speed to 15 km/h (10 mph) and drive less than 1.5 km (1 mile) when towing.
- Before towing, check the dual clutch transmission fluid leak under your vehicle.

# **EMERGENCY COMMODITY (IF EQUIPPED)**

There are some emergency commodities in the vehicle to help you respond to the emergency situation.

## **Fire extinguisher**

If there is small fire and you know how to use the fire extinguisher, take the following steps carefully.

- 1. Pull the pin at the top of the extinguisher that keeps the handle from being accidentally pressed.
- 2. Aim the nozzle toward the base of the fire.
- 3. Stand approximately 2.5 m (8 ft) away from the fire and squeeze the handle to discharge the extinguisher. If you release the handle, the discharge will stop.
- 4. Sweep the nozzle back and forth at the base of the fire. After the fire appears to be out, watch it carefully since it may re-ignite.

## First aid kit

There are some items such as scissors, bandage and adhesive tape and etc. in the kit to give first aid to an injured person.

## **Triangle reflector**

Place the triangle reflector on the road to warn oncoming vehicles during emergencies, such as when the vehicle is parked by the roadside due to any problems.

# Tire pressure gauge (If equipped)

Tires normally lose some air in day-today use, and you may have to add a few pounds of air periodically and it is not usually a sign of a leaking tire, but of normal wear. Always check tire pressure when the tires are cold because tire pressure increases with temperature. To check the tire pressure, take the following steps:

- 1. Unscrew the inflation valve cap that is located on the rim of the tire.
- 2. Press and hold the gauge against the tire valve. Some air will escape as you begin and more will escape if you don't press the gauge in firmly.
- 3. A firm non-leaking push will activate the gauge.
- 4. Read the tire pressure on the gauge to know whether the tire pressure is low or high.
- 5. Adjust the tire pressures to the specified pressure. Refer to "Tires and wheels" in section 8.
- 6. Reinstall the inflation valve cap.

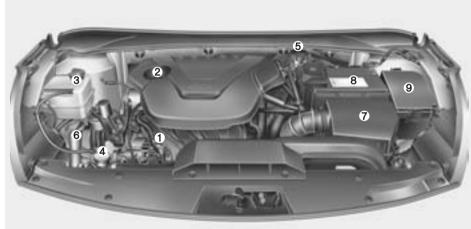
Engine compartment / 7-2 Maintenance services / 7-5 **Owner maintenance / 7-7** Scheduled maintenance service / 7-9 Explanation of scheduled maintenance items / 7-30 Engine oil / 7-33 Engine coolant / 7-36 Brake/clutch fluid / 7-38 Washer fluid / 7-39 Fuel filter / 7-40 Air cleaner / 7-40 Climate control air filter / 7-42 Wiper blades 7-44 Battery / 7-47 Tires and wheels / 7-50 Fuses / 7-62 Light bulbs / 7-81

# Maintenance

Appearance care / 7-100 Emission control system / 7-106

# **ENGINE COMPARTMENT**

■ Gasoline Engine (1.6L)



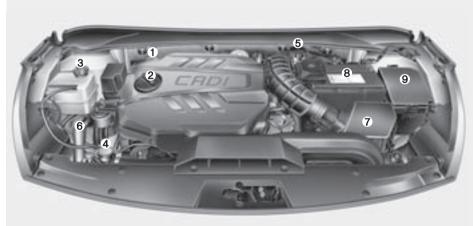
- 1. Engine oil dipstick
- 2. Engine oil filler cap
- 3. Engine coolant reservoir
- 4. Radiator cap
- 5. Brake/clutch\* fluid reservoir
- 6. Windshield washer fluid reservoir
- 7. Air cleaner
- 8. Battery
- 9. Fuse box
- \* : if equipped

✤ The actual engine compartment in the vehicle may differ from the illustration.

OVF071002

7 2

#### ■ Diesel Engine (Smartstream D1.6)

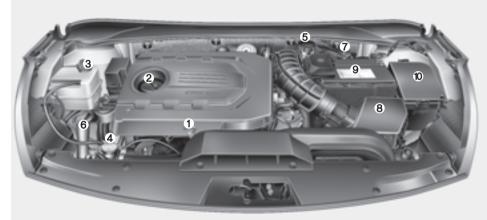


- 1. Engine oil dipstick
- 2. Engine oil filler cap
- 3. Engine coolant reservoir
- 4. Radiator cap
- 5. Brake/clutch\* fluid reservoir
- 6. Windshield washer fluid reservoir
- 7. Air cleaner
- 8. Battery
- 9. Fuse box
- \* : if equipped

\* The actual engine compartment in the vehicle may differ from the illustration.

#### OVF078003L

#### ■ Diesel Engine (1.7L)



- 1. Engine oil dipstick
- 2. Engine oil filler cap
- 3. Engine coolant reservoir
- 4. Radiator cap
- 5. Brake/clutch\* fluid reservoir
- 6. Windshield washer fluid reservoir
- 7. Fuel filter
- 8. Air cleaner
- 9. Battery
- 10. Fuse box
- \* : if equipped

\* The actual engine compartment in the vehicle may differ from the illustration.

OVF075003L

## **MAINTENANCE SERVICES**

You should exercise the utmost care to prevent damage to your vehicle and injury to yourself whenever performing any maintenance or inspection procedures.

Inadequate, incomplete or insufficient servicing may result in operational problems with your vehicle that could lead to vehicle damage, an accident, or personal injury.

#### Owner's responsibility

## **\* NOTICE**

Maintenance Service and Record Retention are the owner's responsibility.

We recommend in general that you have your vehicle serviced by an authorized HYUNDAI dealer.

You should retain documents that show proper maintenance has been performed on your vehicle in accordance with the scheduled maintenance service charts shown on the following pages.

You need this information to establish your compliance with the servicing and maintenance requirements of your vehicle warranties.

Detailed warranty information is provided in your Service Passport.

Repairs and adjustments required as a result of improper maintenance or a lack of required maintenance are not covered when your vehicle is covered by warranty.

### **Owner maintenance precautions**

Improper or incomplete service may result in problems. This section gives instructions only for the maintenance items that are easy to perform.

## **\* NOTICE**

Improper owner maintenance during the warranty period may affect warranty coverage. For details, read the separate Service Passport provided with the vehicle. If you're unsure about any servicing or maintenance procedure, we recommend that the system be seviced by an authorized HYUNDAI dealer.

## WARNING - Maintenance work

- Performing maintenance work on a vehicle can be dangerous. You can be seriously injured while performing some maintenance procedures. If you lack sufficient knowledge and experience or the proper tools and equipment to do the work, we recommend that the system be servied by an authorized HYUNDAI dealer.
- Working under the hood with the engine running is dangerous. It becomes even more dangerous when you wear jewelry or loose clothing. These can become entangled in moving parts and result in injury. Therefore, if you must run the engine while working under the hood, make certain that you remove all jewelry (especially rings, bracelets, watches, and necklaces) and all neckties, scarves, and similar loose clothing before getting near the engine or cooling fans.

## ! CAUTION

- Do not put heavy objects or apply excessive force on top of the engine cover (if equipped) or fuel related parts.
- When you inspect the fuel system (fuel lines and fuel injection devices), we recommend that you contact an authorized HYUNDAI dealer.
- Do not drive long time with the engine cover (if equipped) removed.
- When checking the engine room, do not go near fire.

Fuel, washer fluid, etc. are flammable oils that may cause fire.

- Before touching the battery, ignition cables and electrical wiring, you should disconnect the battery "-" terminal. You may get an electric shock from the electric current.
- When you remove the interior trim cover with a flat bed (-) driver, be careful not to damage the cover.
- Be careful when you replace and clean bulbs to avoid burns or electrical shock.

# **OWNER MAINTENANCE**

We recommend that the following lists are vehicle checks and inspections that should be performed by the owner or an authorized HYUNDAI dealer at the frequencies indicated to help ensure safe, dependable operation of your vehicle.

If you have any question, we recommend that you consult an authorized HYUNDAI dealer.

These Owner Maintenance Checks are generally not covered by warranties and you may be charged for labor, parts and lubricants used.

### Owner maintenance schedule

When you stop for fuel:

- Check the engine oil level.
- Check coolant level in coolant reservoir.
- Check the windshield washer fluid level.
- Look for low or under-inflated tires.
- Check the radiator and condenser. Check if the front of the radiator and condenser are clean and not blocked with leaves, dirt or insects etc.
   If any of the above parts are extremely dirty or you are not sure of their condition, we recommend that you consult an authorized HYUNDAI dealer.

# A WARNING

Be careful when checking your engine coolant level when the engine is hot. Scalding hot coolant and steam may blow out under pressure. This could cause burns or other serious injury. While operating your vehicle:

- Note any changes in the sound of the exhaust or any smell of exhaust fumes in the vehicle.
- Check for vibrations in the steering wheel. Notice any increased steering effort or looseness in the steering wheel, or change in its straight-ahead position.
- Notice if your vehicle constantly turns slightly or "pulls" to one side when traveling on smooth, level road.
- When stopping, listen and check for unusual sounds, pulling to one side, increased brake pedal travel or "hardto-push" brake pedal.
- If any slipping or changes in the operation of your transaxle occurs, check the transaxle fluid level.
- Check manual transaxle operation, including clutch operation.
- Check dual clutch transmission P (Park) function.
- Check parking brake.
- Check for fluid leaks under your vehicle (water dripping from the air conditioning system during or after use is normal).

#### At least monthly:

- Check coolant level in the engine coolant reservoir.
- Check the operation of all exterior lights, including the stoplights, turn signals and hazard warning flashers.
- Check the inflation pressures of all tires including the spare.

#### At least twice a year (i.e., every Spring and Fall) :

- Check radiator, heater and air conditioning hoses for leaks or damage.
- Check windshield washer spray and wiper operation. Clean wiper blades with clean cloth dampened with washer fluid.
- Check headlight alignment.
- Check muffler, exhaust pipes, shields and clamps.
- Check the lap/shoulder belts for wear and function.
- Check for worn tires and loose wheel lug nuts.

At least once a year :

- Clean body and door drain holes.
- Lubricate door hinges and checks, and hood hinges.
- Lubricate door and hood locks and latches.
- Lubricate door rubber weatherstrips.
- Check the air conditioning system.
- Inspect and lubricate dual clutch transmission linkage and controls.
- Clean battery and terminals.
- Check the brake (and clutch) fluid level.

## SCHEDULED MAINTENANCE SERVICE

Follow Normal Maintenance Schedule if the vehicle is usually operated where none of the following conditions apply. If any of the following conditions apply, follow Maintenance Under Severe Usage Conditions.

- Repeated driving short distance of less than 8 km (5 miles) in normal temperature or less than 16 km(10 miles) in freezing temperature
- Extensive engine idling or low speed driving for long distances
- Driving on rough, dusty, muddy, unpaved, graveled or salt-spread roads
- Driving in areas using salt or other corrosive materials or in very cold weather
- Driving in the condition of inflowing sand or dust into engine
- · Driving in heavy traffic area
- Driving on uphill, downhill, or mountain road repeatedly
- Towing a trailer or using a camper, or roof rack
- Driving as a patrol car, taxi, other commercial use of vehicle towing
- Driving over 170 km/h (106 mile/h)
- Frequently driving in stop-and-go condition

If your vehicle is operated under the above conditions, you should inspect, replace or refill more frequently than the following Normal Maintenance Schedule. After the periods or distance shown in the chart, continue to follow the prescribed maintenance intervals.

The following maintenance services must be performed to ensure good emission control and performance. Keep receipts for all vehicle emission services to protect your warranty. Where both mileage and time are shown, the frequency of service is determined by whichever occurs first.

- <sup>\*1</sup> : Check the engine oil level and leak every 500 km (350 miles) or before starting a long trip.
- \*2 : This maintenance schedule depends on fuel quality. It is applicable only when using a qualified fuel <"EN590 or equivalent">. If the diesel fuel specifications don't meet the EN590, it must be replaced according to the severe maintenance schedule.
- <sup>\*3</sup>: If the recommended oil is not available, replace engine oil and engine oil filter every 20,000 km or 12 months.
- \*4 : If the recommended oil and oil filter are not available, replace engine oil and engine oil filter every 15,000 km or 12 months.
- \*5 : The engine oil level should be checked regularly and maintained properly. Operating with an insufficient amount of oil can damage the engine, and such damage is not covered by warranty.
- \*6 : This maintenance schedule depends on fuel quality. It is applicable only when using a qualified fuel <"EN590 or equivalent">. If the diesel fuel specifications don't meet the EN590, it must be replaced more frequently. If there are some important safety matters like fuel flow restriction, surging, loss of power, hard starting problem etc., replace the fuel filter immediately regardless of maintenance schedule and we recommanded that you consult an authorized HYUNDAI dealer for details.

- \*7 : The fuel filter is considered to be maintenance free but periodic inspection is recommended for this maintenance schedule depends on fuel quality. If there are some important matters like fuel flow restriction, surging, loss of power, hard starting problem etc, replace the fuel filter immediately regardless of maintenance schedule and we recommanded that you consult an authorized HYUNDAI dealer for details.
- \*8 : Manual transaxle fluid and dual clutch transmission fluid should be changed anytime they have been submerged in water.
- \*<sup>9</sup> : Inspect drive belt tensioner, idler and alternator pulley and if necessary correct or replace.
- \*10: When adding coolant, use only deionized water or soft water for your vehicle and never mix hard water in the coolant filled at the factory. An improper coolant mixture can result in serious malfunction or engine damage.
- \*11 : Inspect for excessive valve noise and/or engine vibration and adjust if necessary. We recommended that the system should be checked by an authorized HYUNDAI dealer.
- \*12 : If good quality gasolines that meet Europe Fuel standards (EN228) or equivalents including fuel additives is not available, one bottle of additive is recommended. Additives are available from your authorized HYUNDAI dealer along with information on how to use them. Do not mix other additives.

7 10

#### 30,000 km (20,000 miles) or 24 months

- □ Inspect air cleaner filter
- □ Inspect air conditioner refrigerant/compressor (if equipped)
- Inspect battery condition
- Inspect brake lines, hoses and connections (30,000 km (20,000 miles) or 12 months)
- Inspect disc brakes and pads (30,000 km (20,000 miles) or 12 months)
- □ Inspect drive shafts and boots
- Inspect exhaust system
- Inspect front suspension ball joints
- □ Inspect fuel filter cartridge (Diesel) \*6
- □ Inspect fuel lines, fuel hoses and connections (Diesel)
- □ Inspect parking brake
- (30,000 km (20,000 miles) or 12 months)
- $\hfill\square$  Inspect steering gear rack, linkage and boots
- □ Inspect urea solution lines, hoses and connections (Diesel)
- □ Inspect urea solution tank cap (Diesel)

(Continued)

- Inspect tire (pressure & tread wear) (30,000 km (20,000 miles) or 12 months)
- □ Replace brake/clutch(if equipped) fluid
- □ Replace climate control air filter (if equipped)
- □ Replace engine oil and filter (Diesel) \*1 \*2 \*3 \*5
- □ Replace engine oil and filter (Gasoline) \*1 \*4 \*5
- Add fuel additives (Gasoline) \*12 (Every 15,000 km or 12months)

#### 60.000 km (40.000 miles) or 48 months (Continued) □ Inspect urea solution lines, hoses and connections (Diesel) □ Inspect air conditioner refrigerant/compressor (if equipped) □ Inspect urea solution tank cap (Diesel) □ Inspect battery condition Replace air cleaner filter □ Inspect brake lines, hoses and connections Replace brake/clutch(if equipped) fluid (60,000 km (40,000 miles) or 24 months) □ Replace climate control air filter (if equipped) Inspect disc brakes and pads □ Replace engine oil and filter (Diesel) \*1 \*2 \*3 \*5 (60,000 km (40,000 miles) or 24 months) □ Replace engine oil and filter (Gasoline) \*1 \*4 \*5 Inspect drive shafts and boots □ Replace fuel filter cartridge (Diesel) \*6 Inspect exhaust system □ Replace spark plugs (Nickel) (Gasoline) Inspect front suspension ball joints Inspect cooling system □ Inspect fuel filter \*7 (At first, 60,000 km (40,000 miles) or 48months □ Inspect fuel lines, fuel hoses and connections after that, every 30,000 km (20,000 miles) or 24months) (Gasoline, Diesel) □ Inspect drive belt (Diesel) \*9 □ Inspect fuel tank air filter (At first, 90,000 km (60,000 miles) or 48months □ Inspect dual clutch transmission fluid (if equipped) \*8 after that, every 30,000 km (20,000 miles) or 24months) □ Inspect manual transaxle fluid (if equipped) \*8 □ Add fuel additives (Gasoline) \*12 Inspect parking brake (Every 15,000 km or 12months) (60,000 km (40,000 miles) or 24 months) □ Inspect steering gear rack, linkage and boots □ Inspect tire (pressure & tread wear) (60,000 km (40,000 miles) or 24 months) □ Inspect vapor hose and fuel filler cap (Continued)

#### 90,000 km (60,000 miles) or 72 months

- □ Inspect air cleaner filter
- □ Inspect air conditioner refrigerant/compressor (if equipped)
- Inspect battery condition
- □ Inspect brake lines, hoses and connections (90,000 km (60,000 miles) or 36 months)
- Inspect disc brakes and pads (90,000 km (60,000 miles) or 36 months)
- Inspect drive shafts and boots
- Inspect exhaust system
- □ Inspect front suspension ball joints
- □ Inspect fuel filter cartridge (Diesel) \*6
- □ Inspect fuel lines, fuel hoses and connections (Diesel)
- Inspect parking brake
  - (90,000 km (60,000 miles) or 36 months)
- □ Inspect steering gear rack, linkage and boots
- Inspect tire (pressure & tread wear)
   (90,000 km (60,000 miles) or 36 months)
- □ Inspect valve clearance (Gasoline 1.6) \*11
- □ Inspect urea solution lines, hoses and connections (Diesel)
- □ Inspect urea solution tank cap (Diesel)

#### (Continued)

- □ Replace brake/clutch(if equipped) fluid
- □ Replace climate control air filter (if equipped)
- □ Replace engine oil and filter (Diesel) \*1 \*2 \*3 \*5
- □ Replace engine oil and filter (Gasoline) \*1 \*4 \*5
- □ Inspect cooling system (At first, 60,000 km (40,000 miles) or 48months after that, every 30,000 km (20,000 miles) or 24months)
- Inspect drive belt (Diesel) \*9 (At first, 90,000 km (60,000 miles) or 48months after that, every 30,000 km (20,000 miles) or 24months)
- Inspect drive belt (Gasoline) \*9 (At first, 90,000 km (60,000 miles) or 72months after that, every 30,000 km (20,000 miles) or 24months )
- Add fuel additives (Gasoline) \*12 (Every 15,000 km or 12months)

120,000 km (80,000 miles) or 96 months	(Continued)
<ul> <li>Inspect air conditioner refrigerant/compressor (if equipped)</li> <li>Inspect battery condition</li> <li>Inspect brake lines, hoses and connections (120,000 km (80,000 miles) or 48 months)</li> <li>Inspect disc brakes and pads (120,000 km (80,000 miles) or 48 months)</li> <li>Inspect disc brakes and pads (120,000 km (80,000 miles) or 48 months)</li> <li>Inspect drive shafts and boots</li> <li>Inspect drive shafts and boots</li> <li>Inspect font suspension ball joints</li> <li>Inspect fuel filter (Gasoline) *<sup>7</sup></li> <li>Inspect fuel lines, fuel hoses and connections (Gasoline, Diesel)</li> <li>Inspect dual clutch transmission fluid (if equipped) *<sup>8</sup></li> <li>Inspect manual transaxle fluid (if equipped) *<sup>8</sup></li> <li>Inspect steering gear rack, linkage and boots</li> <li>Inspect tire (pressure &amp; tread wear) (120,000 km (80,000 miles) or 48 months)</li> <li>Inspect vapor hose and fuel filler cap</li> <li>Inspect urea solution lines, hoses and connections (Diesel)</li> </ul>	<ul> <li>Replace air cleaner filter</li> <li>Replace brake/clutch (if equipped) fluid</li> <li>Replace climate control air filter (if equipped)</li> <li>Replace engine oil and filter (Diesel) *1*2*3*5</li> <li>Replace engine oil and filter (Gasoline) *1*4*5</li> <li>Replace fuel filter cartridge (Diesel) *6</li> <li>Replace spark plugs (Nickel) (Gasoline)</li> <li>Replace Timing belt system (Timing belt, Oil belt, Tensioner, Idler) every 240,000 km (160,000 miles) (Smartstream D1.6)</li> <li>Inspect cooling system (At first, 60,000 km (40,000 miles) or 48months after that, every 30,000 km (20,000 miles) or 24months)</li> <li>Inspect drive belt (Diesel) *9 (At first, 90,000 km (60,000 miles) or 72months after that, every 30,000 km (20,000 miles) or 24months)</li> <li>Inspect drive belt (Gasoline) *9 (At first, 90,000 km (60,000 miles) or 72months after that, every 30,000 km (20,000 miles) or 24months)</li> <li>Inspect drive belt (Gasoline) *12 (Every 15,000 km or 12months)</li> </ul>

## 150,000 km (100,000 miles) or 120 months

- □ Inspect air cleaner filter
- □ Inspect air conditioner refrigerant/compressor (if equipped)
- Inspect battery condition
- Inspect brake lines, hoses and connections (150,000 km (100,000 miles) or 60 months)
- □ Inspect disc brakes and pads (150,000 km (100,000 miles) or 60 months)
- Inspect drive shafts and boots
- Inspect exhaust system
- □ Inspect front suspension ball joints
- □ Inspect fuel filter cartridge (Diesel) \*6
- □ Inspect fuel lines, fuel hoses and connections (Diesel)
- Inspect parking brake
- (150,000 km (100,000 miles) or 60 months)
- □ Inspect steering gear rack, linkage and boots
- □ Inspect tire (pressure & tread wear)
  - (150,000 km (100,000 miles) or 60 months)
- □ Inspect urea solution lines, hoses and connections (Diesel)
- □ Inspect urea solution tank cap (Diesel)

#### (Continued)

- Replace brake/clutch(if equipped) fluid
   Replace climate control air filter (if equipped)
   Replace engine oil and filter (Diesel) \*1\*2\*3\*5
   Replace engine oil and filter (Gasoline) \*1\*4\*5
- □ Replace spark plugs (Iridium) (Gasoline)
- Inspect cooling system (At first, 60,000 km (40,000 miles) or 48months after that, every 30,000 km (20,000 miles) or 24months)
- Inspect drive belt (Diesel) \*9

   (At first, 90,000 km (60,000 miles) or 48months after that, every 30,000 km (20,000 miles) or 24months)
   Inspect drive belt (Gasoline) \*9
- (At first, 90,000 km (60,000 miles) or 72months after that, every 30,000 km (20,000 miles) or 24months )
- Add fuel additives (Gasoline) \*12 (Every 15,000 km or 12months)



# 180,000 km (120,000 miles) or 144 months

Inspect air conditioner refrigerant/compressor (if equipped)
 Inspect battery condition
 Inspect brake lines, hoses and connections

(180,000 km (120,000 miles) or 72 months)

- □ Inspect disc brakes and pads (180,000 km (120,000 miles) or 72 months)
- □ Inspect drive shafts and boots
- □ Inspect exhaust system
- □ Inspect front suspension ball joints
- □ Inspect fuel filter (Gasoline) \*7
- Inspect fuel lines, fuel hoses and connections (Gasoline, Diesel)
- □ Inspect fuel tank air filter
- □ Inspect dual clutch transmission fluid (if equipped) \*\*
- □ Inspect manual transaxle fluid (if equipped) \*8

□ Inspect parking brake

- (180,000 km (120,000 miles) or 72 months)
- □ Inspect steering gear rack, linkage and boots
- □ Inspect tire (pressure & tread wear) (180,000 km (120,000 miles) or 72 months)
- □ Inspect valve clearance (Gasoline 1.6) \*<sup>11</sup>
- Inspect urea solution lines, hoses and connections (Diesel)
   Inspect urea solution tank cap (Diesel)

## (Continued)

□ Inspect vapor hose and fuel filler cap

- Replace air cleaner filter
- □ Replace brake/clutch(if equipped) fluid
- □ Replace climate control air filter (if equipped)
- □ Replace engine oil and filter (Diesel) \*1 \*2 \*3 \*5
- □ Replace engine oil and filter (Gasoline) \*1 \*4 \*5
- □ Replace fuel filter cartridge (Diesel) \*6
- □ Replace spark plugs (Nickel) (Gasoline)
- □ Inspect cooling system (At first, 60,000 km (40,000 miles) or 48months after that, every 30,000 km (20,000 miles) or 24months)
- □ Inspect drive belt (Diesel) \*<sup>9</sup>
   (At first, 90,000 km (60,000 miles) or 48months after that, every 30,000 km (20,000 miles) or 24months)
- □ Inspect drive belt (Gasoline) \*9 (At first, 90,000 km (60,000 miles) or 72months after that, every 30,000 km (20,000 miles) or 24months )
- Add fuel additives (Gasoline) \*12 (Every 15,000 km or 12months)

#### 210,000 km (140,000 miles) or 168 months

- □ Inspect air cleaner filter
- □ Inspect air conditioner refrigerant/compressor (if equipped)
- Inspect battery condition
- □ Inspect brake lines, hoses and connections (210,000 km (140,000 miles) or 84 months)
- Inspect disc brakes and pads (210,000 km (140,000 miles) or 84 months)
- □ Inspect drive shafts and boots
- Inspect exhaust system
- □ Inspect front suspension ball joints
- □ Inspect fuel filter cartridge (Diesel) \*6
- □ Inspect fuel lines, fuel hoses and connections (Diesel)
- Inspect parking brake
  - (210,000 km (140,000 miles) or 84 months)
- □ Inspect steering gear rack, linkage and boots
- □ Inspect tire (pressure & tread wear)
  - (210,000 km (140,000 miles) or 84 months)
- □ Inspect urea solution lines, hoses and connections (Diesel)
- □ Inspect urea solution tank cap (Diesel)

- □ Replace brake/clutch(if equipped) fluid
- □ Replace climate control air filter (if equipped)
- □ Replace engine oil and filter (Diesel) \*1 \*2 \*3 \*5
- □ Replace engine oil and filter (Gasoline) \*1 \*4 \*5
- Inspect cooling system (At first, 60,000 km (40,000 miles) or 48months after that, every 30,000 km (20,000 miles) or 24months)
- Inspect drive belt (Diesel) \*9 (At first, 90,000 km (60,000 miles) or 48months after that, every 30,000 km (20,000 miles) or 24months)
- Inspect drive belt (Gasoline) \*9 (At first, 90,000 km (60,000 miles) or 72months after that, every 30,000 km (20,000 miles) or 24months )
- Replace coolant \*<sup>10</sup>
   (At first, 210,000 km (120,000 miles) or 120 months after that, every 30,000 km (20,000 miles) or 24months)
- Add fuel additives (Gasoline) \*12 (Every 15,000 km or 12months)

#### 240,000 km (160,000 miles) or 192 months (Continued) □ Inspect air conditioner refrigerant/compressor (if equipped) Replace air cleaner filter Inspect battery condition Replace brake/clutch(if equipped) fluid □ Inspect brake lines, hoses and connections Replace climate control air filter (if equipped) (240.000 km (160.000 miles) or 96 months) □ Replace engine oil and filter (Diesel) \*1 \*2 \*3 \*5 □ Replace engine oil and filter (Gasoline) \*1 \*4 \*5 Inspect disc brakes and pads (240,000 km (160,000 miles) or 96 months) □ Replace fuel filter cartridge (Diesel) \*6 Inspect drive shafts and boots □ Replace spark plugs (Nickel) (Gasoline) Replace Timing belt system (Timing belt, Oil belt, Inspect exhaust system Tensioner, Idler) every 240,000 km (160,000 miles) Inspect front suspension ball joints (Smartstream D1.6) □ Inspect fuel filter (Gasoline) \*7 Inspect cooling system □ Inspect fuel lines, fuel hoses and connections (At first, 60,000 km (40,000 miles) or 48months (Gasoline, Diesel) after that, every 30,000 km (20,000 miles) or 24months) Inspect fuel tank air filter □ Inspect drive belt (Diesel) \*9 □ Inspect dual clutch transmission fluid (if equipped) \*8 (At first, 90,000 km (60,000 miles) or 48months □ Inspect manual transaxle fluid (if equipped) \* after that, every 30,000 km (20,000 miles) or 24months) Inspect parking brake □ Inspect drive belt (Gasoline) \*9 (240,000 km (160,000 miles) or 96 months) (At first, 90,000 km (60,000 miles) or 72months after that, every 30,000 km (20,000 miles) or 24months) □ Inspect steering gear rack, linkage and boots □ Inspect Timing belt every 120,000 km (80,000 miles) □ Inspect tire (pressure & tread wear) (Smartstream D1.6) (240,000 km (160,000 miles) or 96 months) □ Replace coolant \*10 □ Inspect vapor hose and fuel filler cap (At first, 210,000 km (120,000 miles) or 120 months □ Inspect urea solution lines, hoses and connections (Diesel) after that, every 30,000 km (20,000 miles) or 24months) □ Inspect urea solution tank cap (Diesel) □ Add fuel additives (Gasoline) \*12 (Continued) (Every 15,000 km or 12months)

## MAINTENANCE UNDER SEVERE USAGE CONDITIONS - FOR GASOLINE ENGINE (1.6 GDI) / DIESEL ENGINE (SMARTSTREAM D1.6/1.7 VGT) (FOR EUROPE)

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.

#### R : Replace

I : Inspect and if necessary, adjust, correct, clean or replace

MAINTENANCE ITEM		MAINTENANCE OPERATION	MAINTENANCE INTERVALS	DRIVING CONDITION
Engine oil and engine oil filter	Gasoline *1	R	Every 15,000 km (10,000 miles) or 12 months	A, B, C, D, E, F, G, H, I, J, K
	Diesel *2	R	Every 15,000 km (10,000 miles) or 12 months	
Air cleaner filter		R	Replace more frequently depending on the condition	C, E
Spark plug	Gasoline	R	Replace more frequently depending on the condition	A, B, H, I, K
Manual transaxle fluid (i	f equipped)	R	Every 120,000 km (80,000 miles)	C, D, E, F, G, H, I, J
Dual clutch transmission fluid (if equipped)		R	Every 120,000 km (80,000 miles)	C, D, E, F, G, H, I, J
Steering gear rack, linkage and boots		I	Inspect more frequently depending on the condition	C, D, E, F, G

\*1 : If the recommended oil and oil filter are not available, replace engine oil and engine oil filter every 7,500 km or 6 months.

\*2 : If the recommended oil is not available, replace engine oil and engine oil filter every 10,000 km or 6 months.

MAINTENANCE ITEM	MAINTENANCE OPERATION	MAINTENANCE INTERVALS	DRIVING CONDITION
Front suspension ball joints	I	Inspect more frequently depending on the condition	C, D, E, F, G
Disc brakes and pads, calipers and rotors	I	Inspect more frequently depending on the condition	C, D, E, G, H
Parking brake	I	Inspect more frequently depending on the condition	C, D, G, H
Drive shaft and boots	I	Inspect more frequently depending on the condition	C, D, E, F, G, H, I
Climate control air filter (if equipped)	R	Replace more frequently depending on the condition	C, E, G

### 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 condition of inflowing sand or dust into engine.
- F : Driving in heavy traffic area.
- G : Driving on uphill, downhill, or mountain roads.
- H : Towing a trailer or using a camper on roof rack.
- I : Driving for patrol car, taxi, commercial car or vehicle towing.
- J : Driving over 170 km/h (106 mile/h)
- K : Frequently driving in stop-and-go conditions

## NORMAL MAINTENANCE SCHEDULE - FOR DIESEL ENGINE (1.7 VGT) (EXCEPT EUROPE)

The following maintenance services must be performed to ensure good emission control and performance. Keep receipts for all vehicle emission services to protect your warranty. Where both mileage and time are shown, the frequency of service is determined by whichever occurs first.

- <sup>\*1</sup> : Check the engine oil level and leak every 500 km (350 miles) or before starting a long trip.
- \*2 : For your convenience, it can be replaced prior to it's interval when you do maintenance of other items.
- \*3 : This maintenance schedule depends on fuel quality. It is applicable only when using a qualified fuel <"EN590 or equivalent">. If the diesel fuel specifications don't meet the EN590, it must be replaced according to the severe maintenance schedule.

If there are some important safety matters like fuel flow restriction, surging, loss of power, hard starting problem etc., replace the fuel filter immediately regardless of maintenance schedule and we recommanded that you consult an authorized HYUNDAI dealer for details.

- \*4 : The engine oil level should be checked regularly and maintained properly. Operating with an insufficient amount of oil can damage the engine, and such damage is not covered by warranty.
- \*5 : Inspect for excessive valve noise and/or engine vibration and adjust if necessary. We recommended that the system should be checked by an authorized HYUNDAI dealer.

- \*6 : The fuel filter is considered to be maintenance free but periodic inspection is recommended for this maintenance schedule depends on fuel quality. If there are some important matters like fuel flow restriction, surging, loss of power, hard starting problem etc, replace the fuel filter immediately regardless of maintenance schedule and we recommanded that you consult an authorized HYUNDAI dealer for details.
- \*7 : When adding coolant, use only deionized water or soft water for your vehicle and never mix hard water in the coolant filled at the factory. An improper coolant mixture can result in serious malfunction or engine damage.
- \*<sup>8</sup> : Inspect drive belt tensoner, idler and alternator pulley and if necessary correct or replace.

### 15,000 km (10,000 miles) or 12months

□ Inspect air cleaner filter - Except Middle East □ Inspect air conditioner refrigerant/compressor (if equipped) □ Inspect battery condition - Except Middle East □ Inspect battery condition - For Middle East (Every 10,000km (6,200 miles) or 6 months) Inspect brake lines, hoses and connections □ Inspect brake/clutch (if equipped) fluid □ Inspect disc brakes and pads □ Inspect drive shafts and boots Inspect exhaust system □ Inspect front suspension ball joints Inspect parking brake □ Inspect steering gear rack, linkage and boots □ Inspect tire (pressure & tread wear) Replace air cleaner filter - For Middle East □ Replace climate control air filter (if equipped) □ Replace engine oil and filter \*1 \*4 (Every 10,000 km (6,500 miles) or 12months)

#### 30,000 km (20,000 miles) or 24months

Inspect air cleaner filter - Except Middle East
□ Inspect air conditioner refrigerant/compressor (if equipped)
Inspect battery condition - Except Middle East
Inspect battery condition - For Middle East
(Every 10,000km (6,200 miles) or 6 months)
Inspect brake lines, hoses and connections
Inspect brake/clutch(if equipped) fluid
Inspect disc brakes and pads
Inspect drive shafts and boots
Inspect exhaust system
Inspect front suspension ball joints
Inspect fuel filter cartridge *3
Inspect fuel lines, hoses and connections
Inspect fuel tank air filter
Inspect parking brake
Inspect steering gear rack, linkage and boots
Inspect tire (pressure & tread wear)
Replace air cleaner filter - For Middle East
Replace climate control air filter (if equipped)
Replace engine oil and filter *1 *4
(Every 10,000 km (6,500 miles) or 12months)

60,000 km (40,000 miles) or 48months

# NORMAL MAINTENANCE SCHEDULE - FOR DIESEL ENGINE (1.7 VGT) (EXCEPT EUROPE) (CONT.)

### 45,000 km (30,000 miles) or 36months

□ Inspect air conditioner refrigerant/compressor (if equipped)	Inspect air cleaner filter - Except Middle East
Inspect battery condition - Except Middle East	□ Inspect air conditioner refrigerant/compressor (if equipped)
Inspect battery condition - For Middle East	Inspect battery condition - Except Middle East
(Every 10,000km (6,200 miles) or 6 months)	Inspect battery condition - For Middle East
Inspect brake lines, hoses and connections	(Every 10,000km (6,200 miles) or 6 months)
Inspect brake/clutch(if equipped) fluid	Inspect brake lines, hoses and connections
Inspect disc brakes and pads	Inspect brake/clutch (if equipped) fluid
Inspect drive shafts and boots	Inspect disc brakes and pads
Inspect exhaust system	Inspect drive shafts and boots
Inspect front suspension ball joints	Inspect exhaust system
Inspect parking brake	Inspect front suspension ball joints
Inspect steering gear rack, linkage and boots	Inspect fuel filler cap
Inspect tire (pressure & tread wear)	Inspect fuel lines, hoses and connections
Replace air cleaner filter	Inspect parking brake
Replace climate control air filter (if equipped)	Inspect steering gear rack, linkage and boots
Replace engine oil and filter *1 *4	Inspect tire (pressure & tread wear)
(Every 10,000 km (6,500 miles) or 12months)	□ Inspect dual clutch transmission fluid (if equipped) *6

(Continued)

(Continued)

- □ Replace air cleaner filter For Middle East
- □ Replace climate control air filter (if equipped)
- □ Replace fuel filter cartridge \*3
- Replace fuel tank air filter
- Replace engine oil and filter \*1 \*4 (Every 10,000 km (6,500 miles) or 12 months)
- □ Inspect cooling system (At first, 60,000 km (40,000 miles) or 48 months after that, every 30,000 km (20,000 miles) or 24 months)
- Inspect drive belt \*<sup>9</sup>
   (At first, 80,000 km (50,000 miles) or 48 months after that, every 20,000 km (12,500 miles) or 12 months)

### 75,000 km (50,000 miles) or 60months

Inspect air cleaner filter - Except Middle East □ Inspect air conditioner refrigerant/compressor (if equipped) □ Inspect battery condition - Except Middle East □ Inspect battery condition - For Middle East (Every 10,000km (6,200 miles) or 6 months) Inspect brake lines, hoses and connections Inspect brake/clutch(if equipped) fluid □ Inspect disc brakes and pads Inspect drive shafts and boots Inspect exhaust system □ Inspect front suspension ball joints □ Inspect parking brake □ Inspect steering gear rack, linkage and boots □ Inspect tire (pressure & tread wear) Replace air cleaner filter - For Middle East □ Replace climate control air filter (if equipped) □ Replace engine oil and filter \*1\*4 (Every 10,000 km (6,500 miles) or 12 months) □ Inspect drive belt \*9 (At first, 80,000 km (50,000 miles) or 48 months after that, every 20,000 km (12,500 miles) or 12 months)

#### 90,000 km (60,000 miles) or 72months

□ Inspect air conditioner refrigerant/compressor (if equipped)

□ Inspect battery condition - Except Middle East

□ Inspect battery condition - For Middle East

(Every 10,000km (6,200 miles) or 6 months)

□ Inspect brake lines, hoses and connections

□ Inspect brake/clutch(if equipped) fluid

□ Inspect disc brakes and pads

□ Inspect drive shafts and boots

Inspect exhaust system

□ Inspect front suspension ball joints

□ Inspect fuel filter cartridge \*3

□ Inspect fuel lines, hoses and connections

□ Inspect fuel tank air filter

Inspect parking brake

□ Inspect steering gear rack, linkage and boots

□ Inspect tire (pressure & tread wear)

Replace air cleaner filter

□ Replace climate control air filter (if equipped)

### Inspect cooling system

(At first, 60,000 km (40,000 miles) or 48 months after that, every 30,000 km (20,000 miles) or 24 months)

(Continued)

### (Continued)

 Replace engine oil and filter \*1 \*4 (Every 10,000 km (6,500 miles) or 12 months)

□ Inspect drive belt \*9

(At first, 80,000 km (50,000 miles) or 48 months after that, every 20,000 km (12,500 miles) or 12 months)

### 105,000 km (70,000 miles) or 84months

Inspect air cleaner filter - Except Middle East
 Inspect air conditioner refrigerant/compressor (if equipped)

□ Inspect battery condition - Except Middle East

Inspect battery condition - For Middle East (Every 10,000km (6,200 miles) or 6 months)

□ Inspect brake lines, hoses and connections

□ Inspect brake/clutch(if equipped) fluid

□ Inspect disc brakes and pads

□ Inspect drive shafts and boots

Inspect exhaust system

□ Inspect front suspension ball joints

Inspect parking brake

□ Inspect steering gear rack, linkage and boots

□ Inspect tire (pressure & tread wear)

□ Replace air cleaner filter - For Middle East

□ Replace climate control air filter (if equipped)

(Continued)

 Replace engine oil and filter \*1 \*4 (Every 10,000 km (6,500 miles) or 12 months)

□ Inspect drive belt \*9 (At first, 80,000 km (50,000 miles) or 48 months after that, every 20,000 km (12,500 miles) or 12 months)

(Continued)

#### 120,000 km (80,000 miles) or 96months

□ Inspect air cleaner filter - Except Middle East

□ Inspect air conditioner refrigerant/compressor (if equipped)

□ Inspect battery condition - Except Middle East

□ Inspect battery condition - For Middle East

(Every 10,000km (6,200 miles) or 6 months)

□ Inspect brake lines, hoses and connections

□ Inspect brake/clutch(if equipped) fluid

Inspect disc brakes and pads

□ Inspect drive shafts and boots

Inspect exhaust system

□ Inspect front suspension ball joints

□ Inspect fuel filler cap

□ Inspect fuel lines, hoses and connections

□ Inspect parking brake

□ Inspect steering gear rack, linkage and boots

□ Inspect tire (pressure & tread wear)

□ Inspect dual clutch transmission fluid (if equipped) \*6

(Continued)

### (Continued)

- □ Replace air cleaner filter For Middle East
- □ Replace climate control air filter (if equipped)
- □ Replace fuel filter cartridge \*3
- Replace fuel tank air filter
- □ Replace coolant \*<sup>8</sup> (At first, 210,000 km (120,000 miles) or 120 months after that, every 30,000 km (20,000 miles) or 24 months \*<sup>2</sup>)
- Replace engine oil and filter \*1 \*4 (Every 10,000 km (6,500 miles) or 12 months)
- □ Inspect cooling system (At first, 60,000 km (40,000 miles) or 48 months after that, every 30,000 km (20,000 miles) or 24 months)
- Inspect drive belt \*9

(At first, 80,000 km (50,000 miles) or 48 months after that, every 20,000 km (12,500 miles) or 12 months)

# MAINTENANCE UNDER SEVERE USAGE CONDITIONS - FOR DIESEL ENGINE (1.7 VGT) (EXCEPT EUROPE)

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.

### R : Replace

I : Inspect and if necessary, adjust, correct, clean or replace

Maintenance item	Maintenance operation	Maintenance intervals	Driving condition
Engine oil and engine oil filter	R	Every 5,000 km (3,000 miles) 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
Dual clutch transmission fluid (if equipped)	R	Every 120,000 km (80,000 miles)	C, D, E, F, G, H, I, K
Steering gear rack, linkage and boots	I	Inspect more frequently depending on the condition	C, D, E, F, G
Front suspension ball joints	I	Inspect more frequently depending on the condition	C, D, E, F, G
Disc brakes and pads, calipers and rotors	I	Inspect more frequently depending on the condition	C, D, E, G, H
Parking brake	I	Inspect more frequently depending on the condition	C, D, G, H
Driveshaft and boots	I	Inspect more frequently depending on the condition	C, D, E, F, G, H, I, K
Climate control air filter (if equipped)	R	Replace more frequently depending on the condition	C, E, G

### 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 condition of inflowing sand or dust into engine.
- F : Driving in heavy traffic area.
- G : Driving on uphill, downhill, or mountain roads.
- H : Towing a trailer or using a camper on roof rack.
- I : Driving for patrol car, taxi, commercial car or vehicle towing.
- J : Driving in very cold weather.
- K : Driving over 170 km/h (106 mile/h).
- L : Frequently driving in stop-and-go conditions.

# EXPLANATION OF SCHEDULED MAINTENANCE ITEMS

### Engine oil and filter

The engine oil and filter should be changed at the intervals specified in the maintenance schedule. If the car is being driven in severe conditions, more frequent oil and filter changes are required.

### **Drive belts**

Inspect all drive belts for evidence of cuts, cracks, excessive wear or oil saturation and replace if necessary. Drive belts should be checked periodically for proper tension and adjusted as necessary.

# ! CAUTION

When you are inspecting the belt, place the ignition switch in the LOCK/OFF or ACC position.

### Fuel filter (cartridge)

A clogged filter can limit the speed at which the vehicle may be driven, damage the emission system and cause multiple issues such as hard starting. If an excessive amount of foreign matter accumulates in the fuel tank, the filter may require replacement more frequently.

After installing a new filter, run the engine for several minutes, and check for leaks at the connections. We recommend that the fuel filter be replaced by an authorized HYUNDAI dealer.

# Fuel lines, fuel hoses and connections

Check the fuel lines, fuel hoses and connections for leakage and damage. We recommend that the fuel lines, fuel hoses and connections be replaced by an authorized HYUNDAI dealer.

A WARNING - Diesel only Never work on injection system with engine running or within 30 seconds after shutting off engine. High pressure pump, rail, injectors and high pressure pipes are subject to high pressure even after the engine stopped. The fuel jet produced by fuel leaks may cause serious injury, if it touch the body. People using pacemakers should not move than 30cm closer to the ECU or wiring harness within the engine room while engine is running, since the high currents in the Common Rail system produce considerable magnetic fields.

### Vapor hose and fuel filler cap

The vapor hose and fuel filler cap should be inspected at those intervals specified in the maintenance schedule. Make sure that a new vapor hose or fuel filler cap is correctly replaced.

# Vacuum crankcase ventilation hoses (if equipped)

Inspect the surface of hoses for evidence of heat and/or mechanical damage. Hard and brittle rubber, cracking, tears, cuts, abrasions, and excessive swelling indicate deterioration. Particular attention should be paid to examine those hose surfaces nearest to high heat sources, such as the exhaust manifold.

Inspect the hose routing to assure that the hoses do not come in contact with any heat source, sharp edges or moving component which might cause heat damage or mechanical wear. Inspect all hose connections, such as clamps and couplings, to make sure they are secure, and that no leaks are present. Hoses should be replaced immediately if there is any evidence of deterioration or damage.

### Air cleaner filter

We recommend that the air cleaner filter be replaced by an authorized HYUNDAI dealer.

## Spark plugs (for gasoline engine)

Make sure to install new spark plugs of the correct heat range.

# A WARNING

Do not disconnect and inspect spark plugs when the engine is hot. You may burn yourself.

### Valve clearance (for gasoline engine 1.6L)

Inspect excessive valve noise and/or engine vibration and adjust if necessary. We recommend that the system be checked by an authorized HYUNDAI dealer.

### **Cooling system**

Check the cooling system parts, such as radiator, coolant reservoir, hoses and connections for leakage and damage. Replace any damaged parts.

### Coolant

The coolant should be changed at the intervals specified in the maintenance schedule.

# Manual transaxle fluid (if equipped)

Inspect the manual transaxle fluid according to the maintenance schedule.

# Dual clutch transmission fluid (if equipped)

Inspect the dual clutch transmission fluid according to the maintenance schedule.

### Brake hoses and lines

Visually check for proper installation, chafing, cracks, deterioration and any leakage. Replace any deteriorated or damaged parts immediately.

### **Brake fluid**

Check brake fluid level in the brake fluid reservoir. The level should be between "MIN" and "MAX" marks on the side of the reservoir. Use only hydraulic brake fluid conforming to DOT 3 or DOT 4 specification.

### Brake pads, calipers and rotors

Check the pads for excessive wear, discs for run out and wear, and calipers for fluid leakage.

For more information on checking the pads or lining wear limit, refer to the HYUNDAI web site.

### (http://service.hyundai-motor.com)

### Suspension mounting bolts

Check the suspension connections for looseness or damage. Retighten to the specified torque.

### **Parking brake**

Inspect the parking brake system including the EPB actuator, wiring and connectors.

# Steering gear rack, linkage & boots/lower arm ball joint

With the vehicle stopped and engine off, check for excessive free-play in the steering wheel.

Check the linkage for bends or damage. Check the dust boots and ball joints for deterioration, cracks, or damage. Replace any damaged parts.

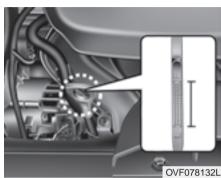
### Drive shafts and boots

Check the drive shafts, boots and clamps for cracks, deterioration, or damage. Replace any damaged parts and, if necessary, repack the grease.

### Air conditioning refrigerant/ compressor (if equipped)

Check the air conditioning lines and connections for leakage and damage.

# **ENGINE OIL**



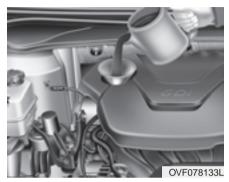
# Checking the engine oil level (Gasoline engine)

- 1. Be sure the vehicle is on level ground.
- 2. Start the engine and allow it to reach normal operating temperature.
- 3. Turn the engine off and wait for a few minutes (about 5 minutes) for the oil to return to the oil pan.
- 4. Pull the dipstick out, wipe it clean, and re-insert it fully.

A WARNING - Radiator hose Be very careful not to touch the radiator hose when checking or adding the engine oil as it may be hot enough to burn you. 5. Pull the dipstick out again and check the level. The level should be between F and L.

# ! CAUTION

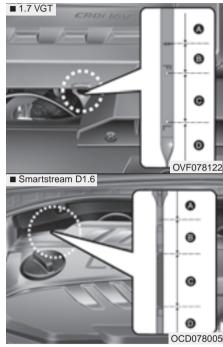
- Do not overfill the engine oil. It may damage the engine.
- Do not spill engine oil, when adding or changing engine oil. If you drop the engine oil on the engine room, wipe it off immediately.
- When you wipe the oil level gauge, you should wipe it with a clean cloth. When mixed with debris, it can cause engine damage.



If it is near or at L, add enough oil to bring the level to F. **Do not overfill.** 

# Use a funnel to help prevent oil from being spilled on engine components.

Use only the specified engine oil. (Refer to "Recommended lubricants and capacities" in section 8.)



Checking the engine oil level (Diesel engine)

Figure	Required action
Range (A)	Recommend to contact an authorized HYUNDAI dealer.
Range (B)	Do not refill engine oil.
Range (C)	Normal. You may add engine oil as long as the oil level does not go above the C range.
Range (D)	You must add oil and make sure that the oil level is in the C Range.

- 1. Be sure the vehicle is on level ground.
- 2. Start the engine and allow it to reach normal operating temperature.
- 3. Turn the engine off and wait for a few minutes (about 5 minutes) for the oil to return to the oil pan.
- 4. Pull the dipstick out, wipe it clean, and re-insert it fully.

A WARNING - Radiator hose Be very careful not to touch the radiator hose when checking or adding the engine oil as it may be hot enough to burn you.

- 5. Pull the dipstick out again and check the level.
- 6. The level should be in the C range. If the level is in the D range, add enough engine oil to bring the level up to the C range.

# .! CAUTION

- Do not spill engine oil, when adding or changing engine oil. If you drop the engine oil on the engine room, wipe it off immediately.
- When you wipe the oil level gauge, you should wipe it with a clean cloth. When mixed with debris, it can cause engine damage.

Maintenance



If it is near or at L, add enough oil to bring the level to F. **Do not overfill.** 

Use only the specified engine oil. (Refer to "Recommended lubricants and capacities" in section 8.)

## Changing the engine oil and filter

We recommend that the engine oil and filter be replaced by an authorized HYUNDAI dealer according to the Maintenance Schedule at the beginning of this section.



# A WARNING

Used engine oil may cause irritation or cancer of the skin if left in contact with the skin for prolonged periods of time. Used engine oil contains chemicals that have caused cancer in laboratory animals. Always protect your skin by washing your hands thoroughly with soap and warm water as soon as possible after handling used oil.

# **ENGINE COOLANT**

The high-pressure cooling system has a reservoir filled with year-round antifreeze coolant. The reservoir is filled at the factory.

Check the antifreeze protection and coolant concentration level at least once a year, at the beginning of the winter season, and before traveling to a colder climate.

When the engine overheats from low engine coolant,suddenly adding engine coolant may cause cracks in the engine. To prevent damage, add engine coolant slowly in small quantities.

# ! CAUTION

Do not drive with no engine coolant. It may cause water pump failure and engine seizure, etc. Checking the coolant level

# **A** WARNING



Removing radiator cap

- Never attempt to remove the radiator cap while the engine is operating or hot. Doing so might lead to cooling system and engine damage and could result in serious personal injury from escaping hot coolant or steam.
- Turn the engine off and wait until it cools down. Use extreme care when removing the radiator cap. Wrap a thick towel around it, and turn it counterclockwise slowly to the first stop. Step back while the pressure is released from the cooling system. When you are sure all the pressure has been released, press down on the cap, using a thick towel, and continue turning counterclockwise to remove it.

(Continued)

### (Continued)

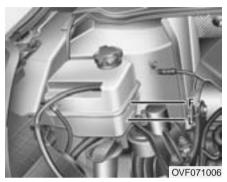
• Even if the engine is not operating, do not remove the radiator cap or the drain plug while the engine and radiator are hot. Hot coolant and steam may still blow out under pressure, causing serious injury.

# 



The electric motor (cooling fan) is controlled by engine coolant temperature, refrigerant pressure and vehicle speed.

It may sometimes operate even when the engine is not running. Use extreme caution when working near the blades of the cooling fan so that you are not injured by a rotating fan blades. As the engine coolant temperature decreases, the electric motor will automatically shut off. This is a normal condition. If your vehicle is equipped with GDI, the electric motor (cooling fan) may operate until you disconnect the negative battery cable.



Check the condition and connections of all cooling system hoses and heater hoses. Replace any swollen or deteriorated hoses.

The coolant level should be filled between F (MAX) and L (MIN) marks on the side of the coolant reservoir when the engine is cool.

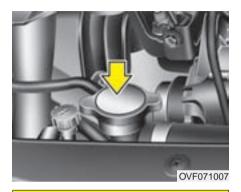
If the coolant level is low, add enough distilled (deionized) water. Bring the level to F (MAX), but do not overfill. If frequent coolant refill is required, we recommend that the system be inspected by an authorized HYUNDAI dealer.

#### Recommended engine coolant

- When adding coolant, use only deionized water or soft water for your vehicle and never mix hard water in the coolant filled at the factory. An improper coolant mixture can result in serious malfunction or engine damage.
- The engine in your vehicle has aluminum engine parts and must be protected by an ethylene-glycol-with phosphate based coolant to prevent corrosion and freezing.
- DO NOT USE alcohol or methanol coolant or mix them with the specified coolant.
- Do not use a solution that contains more than 60% antifreeze or less than 35% antifreeze, which would reduce the effectiveness of the solution.

For mixture percentage, refer to the following table.

Ambient Temperature	Mixture Percentage (volume)		
remperature	Antifreeze	Water	
-15°C (5°F)	35	65	
-25°C (-13°F)	40	60	
-35°C (-31°F)	50	50	
-45°C (-49°F)	60	40	



# 



Do not remove the radiator cap when the engine and radiator are hot. Scalding hot coolant and steam may blow out under pressure causing serious injury.

**Radiator** cap

### Changing the coolant

We recommend that the coolant be replaced by an authorized HYUNDAI dealer according to the Maintenance Schedule at the beginning of this section.

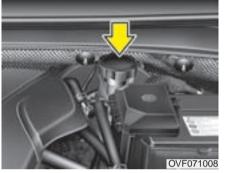
# ! CAUTION

Put a thick cloth or fabric around the radiator cap before refilling the coolant in order to prevent the coolant from overflowing into engine parts such as generator.

# A WARNING - Coolant

- Do not use radiator coolant or antifreeze in the washer fluid reservoir.
- Radiator coolant can severely obscure visibility when sprayed on the windshield and may cause loss of vehicle control or damage to paint and body trim.

## **BRAKE/CLUTCH FLUID**



### Checking the brake fluid level

Check the fluid level in the reservoir periodically. The fluid level should be between MAX and MIN marks on the side of the reservoir.

Before removing the reservoir cap and adding brake fluid, clean the area around the reservoir cap thoroughly to prevent brake fluid contamination.

If the level is low, add fluid to the MAX level. The level will fall with accumulated mileage. This is a normal condition associated with the wear of the brake linings. If the fluid level is excessively low, we recommend that the system be checked by an authorized HYUNDAI dealer. Use only the specified brake fluid. (Refer to "Recommended lubricants and capacities" in section 8.)

Never mix different types of fluid.

# WARNING - Loss of brake fluid

In the event the brake system requires frequent additions of fluid, we recommend that the system be inspected by an authorized HYUNDAI dealer.

## **\* NOTICE**

Before removing the brake/clutch filler cap, read the warning on the cap.

# A WARNING

Clean filler cap before removing. Use only DOT3 or DOT4 brake/ clutch fluid from a sealed container.

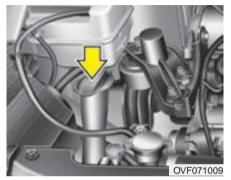
# A WARNING - Brake fluid

When changing and adding brake fluid, handle it carefully. Do not let it come in contact with your eyes. If brake fluid should come in contact with your eyes, immediately flush them with a large quantity of fresh tap water. Have your eyes examined by a doctor as soon as possible.

### . ! CAUTION

Do not allow brake fluid to contact the vehicle's body paint, as paint damage will result. Brake fluid, which has been exposed to open air for an extended time should never be used as its quality cannot be guaranteed. It should be disposed of properly. Don't put in the wrong kind of fluid. A few drops of mineral-based oil, such as engine oil, in your brake system can damage brake system parts.

## WASHER FLUID



### Checking the washer fluid level

Check the fluid level in the washer fluid reservoir and add fluid if necessary. Also, add washer fluid when the low washer fluid level warning indicator ( $\bigcirc$ ) illuminates on the instrument cluster. Plain water may be used if washer fluid is not available. However, use washer solvent with antifreeze characteristics in cold climates to prevent freezing.

## A WARNING - Coolant

- Do not use radiator coolant or antifreeze in the washer fluid reservoir.
- Radiator coolant can severely obscure visibility when sprayed on the windshield and may cause loss of vehicle control or damage to paint and body trim.
- Windshield Washer fluid agents contain some amounts of alcohol and can be flammable under certain circumstances. Do not allow sparks or flame to contact the washer fluid or the washer fluid reservoir. Damage to the vehicle or occupants could occur.
- Windshield washer fluid is poisonous to humans and animals. Do not drink and avoid contacting windshield washer fluid. Serious injury or death could occur.

# FUEL FILTER (FOR DIESEL)

### Draining water from fuel filter

The fuel filter for diesel engine plays an important role of separating water from fuel and accumulating the water in its bottom.

If water accumulates in the fuel filter, the warning light comes on when the ignition switch is in the ON position.



If this warning light illuminates, we recommend that the system be serviced by an authorized HYUNDAI dealer.

# . ! CAUTION

If the water accumulated in the fuel filter is not drained at proper times, damages to the major parts such as the fuel system can be caused by water permeation in the fuel filter.

# **AIR CLEANER**

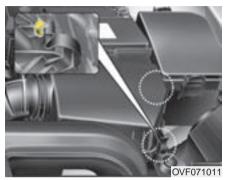


### **Filter replacement**

It must be replaced when necessary, and should not be washed.

You can clean the filter when inspecting the air cleaner element.

Clean the filter by using compressed air.



1. Loosen the air cleaner cover attaching clips and open the cover.



Replace the filter according to the Maintenance Schedule.

If the vehicle is operated in extremely dusty or sandy areas, replace the element more often than the usual recommended intervals. (Refer to "Maintenance under severe usage conditions" in this section.)

# .! CAUTION

- Do not drive with the air cleaner removed; this will result in excessive engine wear.
- When removing the air cleaner filter, be careful that dust or dirt does not enter the air intake, or damage may result.
- We recommend that you use parts for replacement from an authorized HYUNDAI dealer.

- 2. Wipe the inside of the air cleaner.
- 3. Replace the air cleaner filter.
- 4. Lock the cover with the cover attaching clips.

# CLIMATE CONTROL AIR FILTER (IF EQUIPPED)

### **Filter inspection**

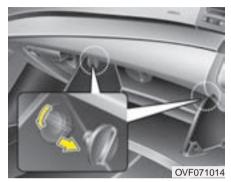
If the vehicle is operated in the severely air-polluted cities or on dusty rough roads for a long period, it should be inspected more frequently and replaced earlier. When you, the owner, replace the climate control air filter, replace it performing the following procedure, and be careful to avoid damaging other components.

Replace the filter according to the maintenance Schedule.



### **Filter replacement**

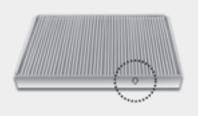
1. Open the glove box and remove the support strap (1).



2. With the glove box open, remove the stoppers on both sides.



 Remove the climate control air filter case while pressing the lock on the right side of the cover.



OBK075017

- 4. Replace the climate control air filter.
- 5. Reassemble in the reverse order of disassembly.

## **\* NOTICE**

Install a new climate control air filter in the correct direction with the arrow symbol( $\downarrow$ ) facing downwards. Otherwise, the climate control effects may decrease, possibly with a noise.

# WIPER BLADES



1JBA5122

### Blade inspection \* NOTICE

Commercial hot waxes applied by automatic car washes have been known to make the windshield difficult to clean. Contamination of either the windshield or the wiper blades with foreign matter can reduce the effectiveness of the windshield wipers. Common sources of contamination are insects, tree sap, and hot wax treatments used by some commercial car washes. If the blades are not wiping properly, clean both the window and the blades with a good cleaner or mild detergent, and rinse thoroughly with clean water.

# ! CAUTION

To prevent damage to the wiper blades, do not use gasoline, kerosene, paint thinner, or other solvents on or near them.

### **Blade replacement**

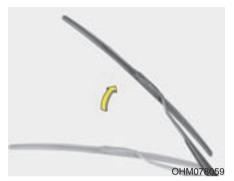
When the wipers no longer clean adequately, the blades may be worn or cracked, and require replacement.

# ! CAUTION

To prevent damage to the wiper arms or other components, do not attempt to move the wipers manually.

# ! CAUTION

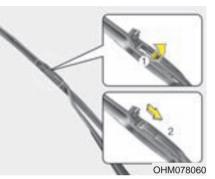
The use of a non-specified wiper blade could result in wiper malfunction and failure.



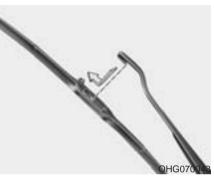
*Front windshield wiper blade* 1. Raise the wiper arm.

# **\* NOTICE**

Do not allow the wiper arm to fall against the windshield, since it may chip or crack the windshield.



2. Lift up the wiper blade clip. Then pull down the blade assembly and remove it.



- 3. Install the blade assembly in the reverse order of removal.
- 4. Return the wiper arm to the original position.



*Rear window wiper blade (wagon)* 1. Raise the wiper arm and pull out the wiper blade assembly.



- 2. Install the new blade assembly by inserting the center part into the slot in the wiper arm until it clicks into place.
- 3. Make sure the blade assembly is installed firmly by trying to pull it slightly.

To prevent damage to the wiper arms or other components, we recommend that the wiper blade be replaced by an authoized HYUNDAI dealer.

## BATTERY



### For best battery service

- Keep the battery securely mounted.
- · Keep the battery top clean and dry.
- · Keep the terminals and connections clean, tight, and coated with petroleum ielly or terminal grease.
- · Rinse any spilled electrolyte from the battery immediately with a solution of water and baking soda.
- · If the vehicle is not going to be used for an extended time, disconnect the battery cables.

## **\* NOTICE**

Basically equipped battery is maintenance free type. If your vehicle is equipped with the battery marked with LOWER and UPPER on the side, you can check the electrolyte level. The electrolyte level should be between LOWER and UPPER. If the electrolyte level is low, it needs to add distilled (demineralized) water (Never add sulfuric acid or other electrolyte). When refill, be careful not to splash the battery and adjacent components. And do not overfill the battery cells. It can cause corrosion on other parts. After then ensure that tighten the cell caps. We recommend that you contact an authorized HYUNDAI dealer.

### A WARNING - Battery dangers



Always read the following instructions carefully when handling a battery.



Keep lighted cigarettes and all other flames or sparks away from the battery.



Hydrogen, a highly combustible gas, is always present in battery cells and may explode if ignited.



Keep batteries out of the reach of children because batteries contain highly corrosive SULFURIC ACID. Do not allow battery acid to contact your skin, eyes, clothing or paint finish.



If any electrolyte gets into your eyes, flush your eyes with clean water for at least 15 minutes and get immediate medical attention.

(Continued)

### (Continued)

If electrolyte gets on your skin, thoroughly wash the contacted area. If you feel a pain or a burning sensation, get medical attention immediately.



Wear eye protection when charging or working near a battery. Always provide ventilation when working in an enclosed space.



An inappropriately disposed battery can be harmful to the environment and human health. Dispose the battery according to your local law(s) or regulation.



The battery contains lead. Do not dispose of it after use. Please return the battery to an authorized HYUNDAI dealer to be recycled.

(Continued)

### (Continued)

- When lifting a plastic-cased battery, excessive pressure on the case may cause battery acid to leak, resulting in personal injury. Lift with a battery carrier or with your hands on opposite corners.
- Never attempt to recharge the battery when the battery cables are connected.
- The electrical ignition system works with high voltage. Never touch these components with the engine running or the ignition switched on.

Failure to follow the above warnings can result in serious bodily injury or death.

### ! CAUTION

If you use unauthorized electronic devices, the battery may be discharged. Never use unauthorized devices.

#### Example



#### OJD072039

\* The actual battery label in the vehicle may differ from the illustration.

### Battery capacity label

- 1. CMF60L-BCI : The HYUNDAI model name of battery
- 2.12V : The nominal voltage
- 3. 60Ah(20HR) : The nominal capacity (in Ampere hours)
- 4. 92RC : The nominal reserve capacity (in min.)
- 5. 550CCA : The cold-test current in amperes by SAE
- 6. 440A : The cold-test current in amperes by EN

### **Battery recharging**

Your vehicle has a maintenance-free, calcium-based battery.

- If the battery becomes discharged in a short time (because, for example, the headlights or interior lights were left on while the vehicle was not in use), recharge it by slow charging (trickle) for 10 hours.
- If the battery gradually discharges because of high electric load while the vehicle is being used, recharge it at 20-30A for two hours.

# . CAUTION

### AGM battery

- Absorbent Glass Matt (AGM) batteries are maintenance-free and we recommend that the AGM battery be serviced by an authorized HYUNDAI dealer. For charging your AGM battery, use only fully automatic battery chargers that are specially developed for AGM batteries.
- When replacing the AGM battery, we recommend that you use parts for replacement from an authorized HYUNDAI dealer.
- Do not open or remove the cap on top of the battery. This may cause leaks of internal electrolyte that could result in severe injury.

# WARNING - Recharging battery

When recharging the battery, observe the following precautions:

- The battery must be removed from the vehicle and placed in an area with good ventilation.
- Do not allow cigarettes, sparks, or flame near the battery.
- Watch the battery during charging, and stop or reduce the charging rate if the battery cells begin gassing (boiling) violently or if the temperature of the electrolyte of any cell exceeds 49°C (120°F).
- Wear eye protection when checking the battery during charging.
- Disconnect the battery charger in the following order.
  - 1. Turn off the battery charger main switch.
  - 2. Unhook the negative clamp from the negative battery terminal.
  - 3. Unhook the positive clamp from the positive battery terminal.

(Continued)

### (Continued)

- Before performing maintenance or recharging the battery, turn off all accessories and stop the engine.
- The negative battery cable must be removed first and installed last when the battery is disconnected.

### Reset items

Items should be reset after the battery has been discharged or the battery has been disconnected.

- Auto up/down window (See section 4)
- Sunroof (See section 4)
- Driver position memory system (See section 4)
- Trip computer (See section 4)
- Climate control system (See section 4)
- Clock (See section 4)
- Audio (See section 4)
- Power tailgate (See section 4)

# **TIRES AND WHEELS**

### **Tire care**

For proper maintenance, safety, and maximum fuel economy, you must always maintain recommended tire inflation pressures and stay within the load limits and weight distribution recommended for your vehicle.

# Recommended cold tire inflation pressures

All tire pressures (including the spare) should be checked when the tires are cold. "Cold Tires" means the vehicle has not been driven for at least three hours or driven less than 1.6 km (1 mile).

Recommended pressures must be maintained for the best ride, top vehicle handling, and minimum tire wear.

For recommended inflation pressure refer to "Tire and wheels" in section 8.



All specifications (sizes and pressures) can be found on a label attached to the vehicle.

### WARNING - Tire underinflation

Severe underinflation (70 kPa (10 psi) or more) can lead to severe heat build-up, causing blowouts, tread separation and other tire failures that can result in the loss of vehicle control leading to severe injury or death. This risk is much higher on hot days and when driving for long periods at high speeds.

# ! CAUTION

- Underinflation also results in excessive wear, poor handling and reduced fuel economy. Wheel deformation also is possible. Keep your tire pressures at the proper levels. If a tire frequently needs refilling, we recommend that the system be checked by an authorized HYUNDAI dealer.
- Overinflation produces a harsh ride, excessive wear at the center of the tire tread, and a greater possibility of damage from road hazards.

## ! CAUTION

- Warm tires normally exceed recommended cold tire pressures by 28 to 41 kPa (4 to 6 psi). Do not release air from warm tires to adjust the pressure or the tires will be underinflated.
- Be sure to reinstall the tire inflation valve caps. Without the valve cap, dirt or moisture could get into the valve core and cause air leakage. If a valve cap is missing, install a new one as soon as possible.

A WARNING - Tire inflation Overinflation or underinflation can reduce tire life, adversely affect vehicle handling, and lead to sudden tire failure. This could result in loss of vehicle control and potential injury. **!** CAUTION - Tire pressure *Always observe the following:* 

- Check tire pressure when the tires are cold. (After vehicle has been parked for at least three hours or hasn't been driven more than 1.6 km (1 mile) since startup.)
- Check the pressure of your spare tire each time you check the pressure of other tires.
- Never overload your vehicle. Be careful not to overload a vehicle luggage rack if your vehicle is equipped with one.
- Worn, old tires can cause accidents. If your tread is badly worn, or if your tires have been damaged, replace them.

### Checking tire inflation pressure

Check your tires once a month or more.

Also, check the tire pressure of the spare tire.

### How to check

Use a good quality gage to check tire pressure. You can not tell if your tires are properly inflated simply by looking at them. Radial tires may look properly inflated even when they're underinflated.

Check the tire's inflation pressure when the tires are cold. - "Cold" means your vehicle has been sitting for at least three hours or driven no more than 1.6 km (1 mile). Remove the valve cap from the tire valve stem. Press the tire gage firmly onto the valve to get a pressure measurement. If the cold tire inflation pressure matches the recommended pressure on the tire and loading information label, no further adjustment is necessary. If the pressure is low, add air until you reach the recommended amount.

If you overfill the tire, release air by pushing on the metal stem in the center of the tire valve. Recheck the tire pressure with the tire gage. Be sure to put the valve caps back on the valve stems. They help prevent leaks by keeping out dirt and moisture.

# A WARNING

- Inspect your tires frequently for proper inflation as well as wear and damage. Always use a tire pressure gauge.
- Tires with too much or too little pressure wear unevenly causing poor handling, loss of vehicle control, and sudden tire failure leading to accidents, injuries, and even death. The recommended cold tire pressure for your vehicle can be found in this manual and on the tire label located on the driver's side center pillar.
- Worn tires can cause accidents. Replace tires that are worn, show uneven wear, or are damaged.
- Remember to check the pressure of your spare tire. HYUNDAI recommends that you check the spare every time you check the pressure of the other tires on your vehicle.

### **Tire rotation**

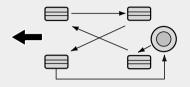
To equalize tread wear, it is recommended that the tires be rotated every 12,000 km (7,500 miles) or sooner if irregular wear develops.

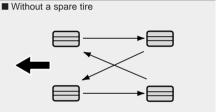
During rotation, check the tires for correct balance.

When rotating tires, check for uneven wear and damage. Abnormal wear is usually caused by incorrect tire pressure, improper wheel alignment, outof-balance wheels, severe braking or severe cornering. Look for bumps or bulges in the tread or side of tire. Replace the tire if you find either of these conditions. Replace the tire if fabric or cord is visible. After rotation, be sure to bring the front and rear tire pressures to specification and check lug nut tightness.

Refer to "Tire and wheels" in section 8.

■ With a full-size spare tire (if equipped)

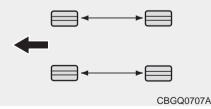




S2BLA790A

S2BLA790

Directional tires (if equipped)



Disc brake pads should be inspected for wear whenever tires are rotated.

### **\* NOTICE**

Rotate radial tires that have an asymmetric tread pattern only from front to rear and not from right to left.

# A WARNING

- Do not use the compact spare tire for tire rotation.
- Do not mix bias ply and radial ply tires under any circumstances. This may cause unusual handling characteristics that could result in death, severe injury, or property damage.

### Wheel alignment and tire balance

The wheels on your vehicle were aligned and balanced carefully at the factory to give you the longest tire life and best overall performance.

In most cases, you will not need to have your wheels aligned again. However, if you notice unusual tire wear or your vehicle pulling one way or the other, the alignment may need to be reset.

If you notice your vehicle vibrating when driving on a smooth road, your wheels may need to be rebalanced.

# .! CAUTION

Improper wheel weights can damage your vehicle's aluminum wheels. Use only approved wheel weights.



### **Tire replacement**

If the tire is worn evenly, a tread wear indicator will appear as a solid band across the tread. This shows there is less than 1.6 mm (1/16 in.) of tread left on the tire. Replace the tire when this happens.

Do not wait for the band to appear across the entire tread before replacing the tire.

# ! CAUTION

When replacing the tires, recheck and tighten the wheel nuts after driving about 1,000 km (620 miles). If the steering wheel shakes or the vehicle vibrates while driving, the tire is out of balance. Align the tire balance. If the problem is not solved, we recommend that you contact an authorized HYUNDAI dealer.

# A WARNING - Replacing tires

- Driving on worn-out tires is very hazardous and will reduce braking effectiveness, steering accuracy, and traction.
- Your vehicle is equipped with tires designed to provide for safe ride and handling capability. Do not use a size and type of tire and wheel that is different from the one that is originally installed on your vehicle. It can affect the safety and performance of your vehicle, which could lead to handling failure or rollover and serious injury. When replacing the tires, be sure to equip all four tires with the tire and wheel of the same size, type, tread, brand and load-carrying capacity.

(Continued)

### (Continued)

- The use of any other tire size or type may seriously affect ride, handling, ground clearance, stopping distance, body to tire clearance, snow tire clearance, and speedometer reliability.
- When replacing tires (or wheels), it is recommended to replace the two front or two rear tires (or wheels) as a pair. Replacing just one tire can seriously affect your vehicle's handling.
- The ABS works by comparing the speed of the wheels. Tire size can affect wheel speed. When replacing tires, all 4 tires must use the same size originally supplied with the vehicle. Using tires of a different size can cause the ABS (Anti-lock Brake System) and ESC (Electronic Stability Control) to work irregularly.

# *Compact spare tire replacement (if equipped)*

A compact spare tire has a shorter tread life than a regular size tire. Replace it when you can see the tread wear indicator bars on the tire. The replacement compact spare tire should be the same size and design tire as the one provided with your new vehicle and should be mounted on the same compact spare tire wheel. The compact spare tire is not designed to be mounted on a regular size wheel, and the compact spare tire wheel is not designed for mounting a regular size tire.

### Wheel replacement

When replacing the metal wheels for any reason, make sure the new wheels are equivalent to the original factory units in diameter, rim width and offset.

# **A** WARNING

A wheel that is not the correct size may adversely affect wheel and bearing life, braking and stopping abilities, handling characteristics, ground clearance, body-to-tire clearance, snow chain clearance, speedometer and odometer calibration, headlight aim and bumper height.

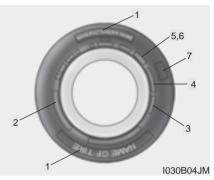
### **Tire traction**

Tire traction can be reduced if you drive on worn tires, tires that are improperly inflated or on slippery road surfaces. Tires should be replaced when tread wear indicators appear. To reduce the possibility of losing control, slow down whenever there is rain, snow or ice on the road.

### **Tire maintenance**

In addition to proper inflation, correct wheel alignment helps to decrease tire wear. If you find a tire is worn unevenly, have your dealer check the wheel alignment.

When you have new tires installed, make sure they are balanced. This will increase vehicle ride comfort and tire life. Additionally, a tire should always be rebalanced if it is removed from the wheel.



### Tire sidewall labeling

This information identifies and describes the fundamental characteristics of the tire and also provides the tire identification number (TIN) for safety standard certification. The TIN can be used to identify the tire in case of a recall.

### 1. Manufacturer or brand name Manufacturer or Brand name is shown.

### 2. Tire size designation

A tire's sidewall is marked with a tire size designation. You will need this information when selecting replacement tires for your car. The following explains what the letters and numbers in the tire size designation mean.

Example tire size designation:

(These numbers are provided as an example only; your tire size designator could vary depending on your vehicle.)

### 205/60R16 92V

- 205 Tire width in millimeters.
- 60 Aspect ratio. The tire's section height as a percentage of its width.
- R Tire construction code (Radial).
- 16 Rim diameter in inches.

- 92 Load Index, a numerical code associated with the maximum load the tire can carry.
- V Speed Rating Symbol. See the speed rating chart in this section for additional information.

#### Wheel size designation

Wheels are also marked with important information that you need if you ever have to replace one. The following explains what the letters and numbers in the wheel size designation mean.

# Example wheel size designation: **7.0JX16**

- 7.0 Rim width in inches.
- J Rim contour designation.
- 16 Rim diameter in inches.

### Tire speed ratings

The chart below lists many of the different speed ratings currently being used for passenger cars. The speed rating is part of the tire size designation on the sidewall of the tire. This symbol corresponds to that tire's designed maximum safe operating speed.

Speed Rating Symbol	Maximum Speed
S	180 km/h (112 mph)
Т	190 km/h (118 mph)
Н	210 km/h (130 mph)
V	240 km/h (149 mph)
Z	Above 240 km/h (149 mph)

### 3. Checking tire life

(TIN : Tire Identification Number) Any tires that are over 6 years, based on the manufacturing date, tire strength and performance, decline with age naturally (even unused spare tires). Therefore, the tires (including the spare tire) should be replaced by new ones. You can find the manufacturing date on the tire sidewall (possibly on the inside of the wheel), displaying the DOT Code. The DOT Code is a series of numbers on a tire consisting of numbers and English letters. The manufacturing date is designated by the last four digits (characters) of the DOT code.

## DOT : XXXX XXXX OOOO

The front part of the DOT means a plant code number, tire size and tread pattern and the last four numbers indicate week and year manufactured.

For example:

DOT XXXX XXXX 2218 represents that the tire was produced in the 22th week of 2018.

## A WARNING - Tire age

Tires degrade over time, even when they are not being used. Regardless of the remaining tread, it is recommended that tires generally be replaced after six (6) years of normal service. Heat caused by hot climates or frequent high loading conditions can accelerate the aging process. Failure to follow this Warning can result in sudden tire failure, which could lead to a loss of control and an accident involving serious injury or death.

### 4. Tire ply composition and material

The number of layers or plies of rubber-coated fabric are in the tire. Tire manufacturers also must indicate the materials in the tire, which include steel, nylon, polyester, and others. The letter "R" means radial ply construction; the letter "D" means diagonal or bias ply construction; and the letter "B" means belted-bias ply construction.

# 5. Maximum permissible inflation pressure

This number is the greatest amount of air pressure that should be put in the tire. Do not exceed the maximum permissible inflation pressure. Refer to the Tire and Loading Information label for recommended inflation pressure.

### 6. Maximum load rating

This number indicates the maximum load in kilograms and pounds that can be carried by the tire. When replacing the tires on the vehicle, always use a tire that has the same load rating as the factory installed tire.

#### 7. Uniform tire quality grading

Quality grades can be found where applicable on the tire sidewall between tread shoulder and maximum section width.

For example:

TREADWEAR 200 TRACTION AA TEMPERATURE A

#### Tread wear

The tread wear grade is a comparative rating based on the wear rate of the tire when tested under controlled conditions on a specified government test course. For example, a tire graded 150 would wear one-and-ahalf times ( $1\frac{1}{2}$ ) as well on the government course as a tire graded 100.

The relative performance of tires depends upon the actual conditions of their use, however, and may depart significantly from the norm because of variations in driving habits, service practices and differences in road characteristics and climate.

These grades are molded on the side-walls of passenger vehicle tires. The tires available as standard or optional equipment on your vehicles may vary with respect to grade.

### Traction - AA, A, B & C

The traction grades, from highest to lowest, are AA, A, B and C. Those grades represent the tires ability to stop on wet pavement as measured under controlled conditions on specified government test surfaces of asphalt and concrete. A tire marked C may have poor traction performance.

# A WARNING

The traction grade assigned to this tire is based on straightahead braking traction tests, and does not include acceleration, cornering, hydroplaning, or peak traction characteristics.

### Temperature -A, B & C

The temperature grades are A (the highest), B and C representing the tire's resistance to the generation of heat and its ability to dissipate heat when tested under controlled conditions on a specified indoor laboratory test wheel.

Sustained high temperature can cause the material of the tire to degenerate and reduce tire life, and excessive temperature can lead to sudden tire failure. Grades B and A represent higher levels of performance on the laboratory test wheel than the minimum required by the law.

# WARNING - Tire temperature

The temperature grade for this tire is established for a tire that is properly inflated and not overloaded. Excessive speed, underinflation, or excessive loading, either separately or in combination, can cause heat build-up and possible sudden tire failure. This can cause loss of vehicle control and serious injury or death.

## Low aspect ratio tire (if equipped)

Low aspect ratio tires, whose aspect ratio is lower than 50, are provided for sporty looks.

Because the low aspect ratio tires are optimized for handling and braking, it may be more uncomfortable to ride in and there is more noise compare with normal tires.

# ! CAUTION

Because the sidewall of the low aspect ratio tire is shorter than the normal, the wheel and tire of the low aspect ratio tire is easier to be damaged. So, follow the instructions below.

- When driving on a rough road or off road, drive cautiously because tires and wheels may be damaged. And after driving, inspect tires and wheels.
- When passing over a pothole, speed bump, manhole, or curb stone, drive slowly so that the tires and wheels are not damaged.
- If the tire is impacted, we recommend that you inspect the tire condition or contact an authorized HYUNDAI dealer.
- To prevent damage to the tire, inspect the tire condition and pressure every 3,000km.

## ! CAUTION

- It is not easy to recognize the tire damage with your own eyes. But if there is the slightest hint of tire damage, even though you cannot see the tire damage with your own eyes, have the tire checked or replaced because the tire damage may cause air leakage from the tire.
- If the tire is damaged by driving on a rough road, off road, pothole, manhole, or curb stone, it will not be covered by the warranty.
- You can find out the tire information on the tire sidewall.

# FUSES

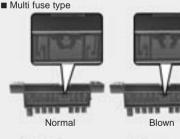
#### Blade type



Normal Cartridge type



Normal







Blown

Blown





Blown

OVF071101

A vehicle's electrical system is protected from electrical overload damage by fuses.

This vehicle has 3 (or 4) fuse panels, one located in the driver's side panel bolster. others in the engine compartment near the battery.

If any of your vehicle's lights, accessories, or controls do not work, check the appropriate circuit fuse. If a fuse has blown, the element inside the fuse will be melted.

If the electrical system does not work, first check the driver's side fuse panel.

Before replacing a blown fuse, disconnect the negative battery cable.

Always replace a blown fuse with one of the same rating.

If the replacement fuse blows, this indicates an electrical problem. Avoid using the system involved and we recommend that you consult an authorized HYUNDAI dealer.

Three kinds of fuses are used: blade type for lower amperage rating, cartridge type, and multi fuse type for higher amperage ratings.

## A WARNING - Fuse replacement

- Never replace a fuse with anything but another fuse of the same rating.
- A higher capacity fuse could cause damage and possibly a fire.
- Never install a wire or aluminum foil instead of the proper fuse even as a temporary repair. It may cause extensive wiring damage and a possible fire.

# ! CAUTION

Do not use a screwdriver or any other metal object to remove fuses because it may cause a short circuit and damage the system.

# **\* NOTICE**

The actual fuse/relay panel label may differ from equipped items.

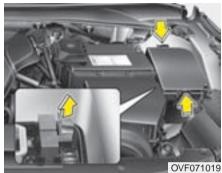
# ! CAUTION

- When replacing a blown fuse or relay with a new one, make sure the new fuse or relay fits tightly into the clips. The incomplete fastening fuse or relay may cause the vehicle wiring and electric systems damage and a possible fire.
- Do not remove fuses, relays and terminals fastened with bolts or nuts. The fuses, relays and terminals may be fastened incompletely, and it may cause a possible fire. If fuses, relays and terminals fastened with bolts or nuts are blown, we recommend that you consult an authorized HYUNDAI dealer.
- Do not input any other objects except fuses or relays into fuse/relay terminals such as a driver or wiring. It may cause contact failure and system malfunction.



Inner panel fuse replacement

- 1. Turn the ignition switch and all other switches off.
- 2. Open the fuse panel cover.



- 3. Pull the suspected fuse straight out. Use the removal tool provided in the engine compartment fuse panel.
- 4. Check the removed fuse; replace it if it is blown.
- 5. Push in a new fuse of the same rating, and make sure it fits tightly in the clips.

If it fits loosely, we recommend that you consult an authorized HYUNDAI dealer.

If you do not have a spare, use a fuse of the same rating from a circuit you may not need for operating the vehicle, such as the cigar lighter fuse. If the headlights or other electrical components do not work and the fuses are OK, check the fuse block in the engine compartment. If a fuse is blown, it must be replaced.



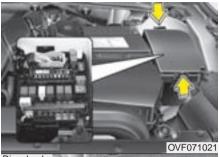
Fuse switch

Always, put the fuse switch at the ON position.

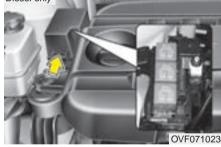
If you move the switch to the OFF position, some items such as audio and digital clock must be reset and transmitter (or smart key) may not work properly.

# ! CAUTION

Always place the fuse switch in the ON position while driving the vehicle.



Diesel only



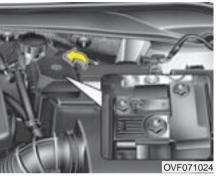
Engine compartment panel fuse replacement

- 1. Turn the ignition switch and all other switches off.
- 2. Remove the fuse box cover by pressing the tap and pulling up.

- 3. Check the removed fuse; replace it if it is blown. To remove or insert the fuse, use the fuse puller in the engine compartment fuse panel.
- 4. Push in a new fuse of the same rating, and make sure it fits tightly in the clips. If it fits loosely, we recommend that you consult an authorized HYUNDAI dealer.

# ! CAUTION

After checking the fuse box in the engine compartment, securely install the fuse box cover. If not, electrical failures may occur from water leaking in.



### Main fuse

If the main fuse is blown, it must be removed as follows:

- 1. Turn off the engine.
- 2. Disconnect the negative battery cable.
- 3. Remove the nuts shown in the picture above.
- 4. Replace the fuse with a new one of the same rating.
- 5. Reinstall in the reverse order of removal.



### Multi fuse

If the multi fuse is blown, it must be removed as follows:

- 1. Turn off the engine.
- 2. Disconnect the negative battery cable.
- 3. Remove the fuse panel on the right side in the engine compartment.
- 4. Remove the nuts shown in the picture above.
- 5. Replace the fuse with a new one of the same rating.
- 6. Reinstall in the reverse order of removal.

# **\* NOTICE**

If the multi fuse or main fuse is blown, we recommend that you consult an authorized HYUNDAI dealer.



**Fuse/Relay panel description** 

Inside the fuse/relay box covers, you can find the fuse/relay label describing fuse/ relay name and capacity.

# **\* NOTICE**

Not all fuse panel descriptions in this manual may be applicable to your vehicle. It is accurate at the time of printing. When you inspect the fuse box on your vehicle, refer to the fuse box label.



OVF076119

No.	Fuse rating	Symbol	Fuse Name	Protected component
1	20A	POWER OUTLET 2	POWER OUTLET 2	Console Power Outlet, Rear Power Outlet
2	30A	PWR	POWER TAIL GATE	Power Tail Gate Control Module
3	10A	MODULE 1	MODULE 1	Smart Key Control Module, BCM, Audio, AMP, JBL AMP, A/V & Navigation Head Unit, DC-DC Converter (Audio), Over Head Console Lamp, DC-DC Converter (AMP), Power Outside Mirror Switch
4	15A	MODULE 4	MODULE 4	Head Lamp Leveling Device Actuator LH/RH, Crash Pad Switch, Adaptive Front Lighting Module
5	7.5A	MODULE 3 MODULE 3		Smart Key Control Module, BCM, Panorama Sunroof, Rain Sensor, Driver/Passenger CCS Control Module, EMS Block (Head Lamp Washer Relay), Water Thermo Switch
6	15A	POWER OUTLET 1 OUTLET 1		Front Power Outlet, Cigarette Lighter
7	20A	A PASS P/SEAT		Passenger Seat Manual Switch
8	10A	( <u></u>	HTD MIRR	Driver/Passenger Power Outside Mirror, ECM/PCM, A/C Control Module
9	25A	AMP	AMP	AMP, JBL AMP, DC-DC Converter (AMP)
10	25A	25A 👽 WIPER FRT		ICM Relay Box (Rain Sensor Relay), Multifunction Switch, E/R Junction Block (RLY. 7), Front Wiper Motor
11	7.5A	7.5A 🇱 A/CON		E/R Junction Block (RLY. 4), EMS Block (Fuel Heater Relay), Diesel Block (PTC Heater Relay #2/#3), A/C Control Module
12	15A		STEERING WHEEL HEATER	Clock Spring (Steering Wheel Heater)

## Instrument panel (Driver's side fuse panel)

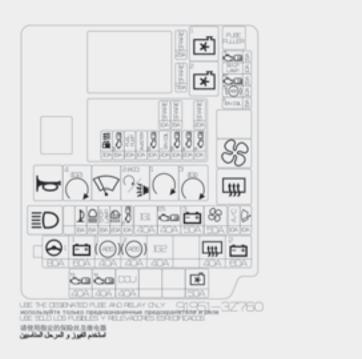
No.	Fuse rating	Symbol	Fuse Name	Protected component
13	25A	LH 🛃	P/WDW LH	Power Window LH Relay, Power Window Main Switch, Driver/Passenger Safety Power Window Module, Rear Safety Power Window Module LH, Passenger Power Window Switch
14	10A		TAIL GATE OPEN/ TRUNK OPEN	Tail Gate Open Relay, Trunk Lid Latch (SEDAN), Power Tail Gate Latch/Tail Gate Latch (WAGON), ICM Relay Box (Fuel Filler Lock/Unlock Relay)
15	30A		P/SEAT DRV	Driver IMS Module, Driver Seat Manual Switch
16	10A	MODULE 2	MODULE 2	BCM, Crash Pad Switch, Multipurpose Check Connector, Stop Lamp Switch, Active Air Flap Unit, Glow Relay Unit, A/C Control Module, Smart Parking Assist Control Module, A/V & Navigation Head Unit, DC-DC Converter, ECS Module, Lane Keeping Assist Module, Electro Chromic Mirror, Parking Assist Sensor, Tire Pressure Monitoring Module, Driver/Passenger CCS Control Module, ATM Shift Lever IND. Console Switch, Driver/Passenger Seat Warmer Module
17	15A		WIPER RR/ CURTAIN	Rear Wiper Relay, Rear Wiper Motor, Multifunction Switch, Rear Curtain Module
18	10A	BRAKE SWITCH	BRAKE SWITCH	Stop Lamp Switch, Smart Key Control Module
19	25A	RH 🛃	P/WDW RH	Power Window RH Relay, Power Window Main Switch, Passenger Power Window Switch, Driver/Passenger Safety Power Window Module, Rear Safety Power Window Module RH
20	10A	<b>FD</b> <sup>1</sup>	IMMO. 1	Smart Key Control Module, Start/Stop Button Switch, Immobilizer Module
21	7.5A	MODULE 5	MODULE 5	Driver/Passenger Smart Key Outside Handle, Driver/Passenger Power Outside Mirror, Active Air Flap Unit, Rear Seat Warmer Switch LH/RH, Auto Light & Photo Sensor, Sport Mode Switch, Key Solenoid

No.	Fuse rating	Symbol	Fuse Name	Protected component
22	20A	IG1	IG1	E/R Junction Block (Fuse - F27, F28, F29, F30, F31)
23	10A	MODULE 6	MODULE 6	Instrument Cluster, Sport Mode Switch, Front Seat Warmer & CCS Switch LH/RH, Electronic Parking Brake Module
24	10A		MDPS	MDPS Unit
25	20A		DR LOCK	Door Lock/Unlock Relay, ICM Relay Box (Dead Lock Relay) Driver/Passenger Door Lock Actuator, Rear Door Lock Actuator LH/RH
26	15A	FRT	S/HEATER FRT	Driver/Passenger CCS Control Module, Driver/Passenger Seat Warmer Module
27	10A	챴	INTERIOR LAMP	Driver/Passenger Door Lamp, Overhead Console Lamp, Room Lamp, Glove Box Lamp, Luggage Lamp LH/RH, Driver/Passenger Foot Lamp, Trunk Room Lamp, Rear Personal Lamp LH/RH, Vanity Lamp LH/RH
28	15A	MULTI MEDIA	MULTI MEDIA	Audio, A/V & Navigation Head Unit, DC-DC Converter (Audio)
29	15A	×	A/BAG	SRS Control Module
30	10A	MODULE 7	MODULE 7	Rear Curtain Module, ECS Module
31	7.5A	MEMORY 1	MEMORY 1	Instrument Cluster, Tire Pressure Monitoring Module, Rear Curtain Module, Tilt Sensor, A/C Control Module, BCM, Ultrasonic Instrusion Protection Sensor, Siren Control Module, Driver IMS Module, Power Outside Mirror Switch
32	7.5A	IND	A/BAG IND	Instrument Cluster (IND.)
33	7.5A		IMMO. 2	Smart Key Control Module, Immobilizer Module

No.	Fuse rating	Symbol	Fuse Name	Protected component
34	10A		S/HEATER RR	Rear Seat Warmer LH/RH
35	7.5A	MEMORY 2	MEMORY 2 RF Receiver	
36	10A	<sup>1</sup> O	PDM 1	Smart Key Control Module
37	7.5A	C	START	W/O Button Start : E/R Junction Block (RLY. 8), Ignition Lock Switch, Transaxle Range Switch With Button Start : ECM/PCM, Transaxle Range Switch
38	20A	$\langle \rangle$	SUNROOF	Panorama Sunroof



Engine compartment main fuse panel



OVF078129L

## Engine compartment main fuse panel

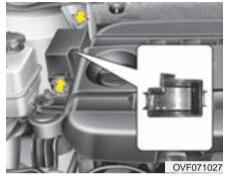
No.		Fuse rating	Symbol	Fuse Name	Protected component
	1	80A		MDPS1	MDPS Unit
	2	60A	1	B+1	Smart Junction Box (IPS 0 (4CH), IPS 1 (4CH), IPS 2 (2CH), Fuse - F13/F14/F19/F20/F21/F26/F36)
	3	40A	1 ((ABS))	ABS1	ESC Control Module, Multipurpose Check Connector
MULTI FUSE	4	40A	2 ((ABS))	ABS2	ESC Control Module, Multipurpose Check Connector
	5	40A	IG2	IG2	RLY. 9 (Start Relay), Ignition Switch (W/O Button Start), RLY. 6 (PDM 4 (IG2) Relay - With Button Start)
	6	40A	<b>[#</b> ]	RR HTD	RLY. 11 (RR HTD Relay)
	7	60A	2 — +	B+2	Smart Junction Box (IPS 3 (4CH), IPS 4 (4CH), Fuse - F2/F7/F9/F15)
	8	40A	<sup>T3</sup> 🗂 🕮	TCU3	TCM (D4FD-DCT)
FUOF	9	40A	<sup>T4</sup> 🖒 🔟	TCU4	TCM (D4FD-DCT)
FUSE	10	50A	۲ ۲	C/FAN	RLY. 1 (C/FAN LO Relay), RLY. 2 (C/FAN HI Relay)
	11	40A	DCU	DCU	Dosing Control Unit

No.		Fuse rating	Symbol	Fuse Name	Protected component
	12	15A	Ŋ	HORN	RLY. 5 (Horn Relay), ICM Relay Box (Burglar Alarm Horn Relay)
	13	15A	ID	H/LP HI	RLY. 12 (H/LP HI Relay)
	14	15A	STOP LAMP	STOP LP	Stop Signal Electronic Module
	15	20A	IQ	H/LP WASHER	ICM Relay Box (Head Lamp Washer Relay)
	16	10A	<sup>T2</sup> 💭 🔟	TCU2	TCM (D4FD-DCT)
	17	40A	IG1	IG1	W/O Button Start : Ignition Switch, With Button Start : RLY. 8 (PDM 2 (ACC) Relay)/RLY. 10 (PDM 3 (IG1) Relay
FUSE	18	40A	<sup>E5</sup> 💭 🕮	EMS	EMS Block (Engine Control Relay, Fuse - F32/F33/F34)
	19	50A	3 	B+3	Smart Junction Box (Leak Current Autocut Device, Fuse - F18/F25/F30/F34/F38)
	20	50A	S	BLOWER	RLY. 4 (Blower Relay)
	21	10A	A/C	A/CON SW	A/C Control Module
	22	10A	Þ	WIPER FRT	ECM/PCM, Lane Keeping Assist Module, Rain Sensor, RLY.7 (Front Wiper Relay), Front Wiper Motor
	23	15A	™ ്റ്റെ 🗐	TCU1	A/T - TCM, Transaxle Range Switch
	24	10A	B/UP LAMP	B/UP LP	M/T - Back-Up Lamp Switch, A/T - Rear Combination Lamp (In) LH/RH, Rear Curtain Module Electro Chromic Mirror, IPS Control Module, Audio, A/V & Navigation Head Unit

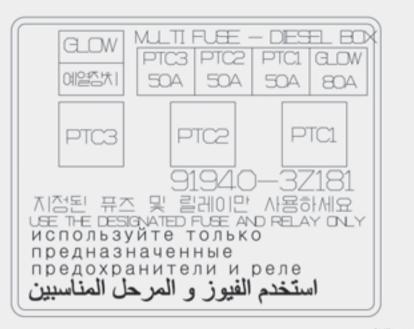
No.		Fuse rating	Symbol	Fuse Name	Protected component
	25	15A	<sup>E3</sup> 💭 🕮	ECU3	ECM/PCM, Air Flow Sensor, PM Sensor, Glow Relay Unit
	26	10A	3 (ABS))	ABS3	ESC Control Module
	27	15A	IGN COIL 2	IGN COIL2	G4FD/G4NC - Ignition Coil #1/ #2/ #3/ #4, Condenser, Nox Sensor
	28	30A	<b>E</b> d titi	F/HEAT	Fuel Heater Relay (D4FD)
	29	15A		ECU4	G4FD/D4FD : ECM G4NA/G4NC : PCM (A/T), ECM (M/T)
FUSE	30	20A	FUEL PUMP	F/PUMP	Fuel Pump Relay
	31	10A	INJECTOR	INJECTOR	G4FD/G4NC : Fuel Pump Relay G4NA : Injector #1/#2/#3/#4, Fuel Pump Relay D4FD/D4FIII : Fuel Pressure Regulating Valve, EGR Cooling Bypass Solenoid Valve, Fuel Pump Relay, Fuel Heater Relay
	32	10A	<sup>E2</sup> (5) 🕮	ECU2	G4FD : ECM G4NC : PCM (A/T), ECM (M/T) D4FD/D4FIII : Electronic VGT Actuator
	33	20A	IGN COIL1	IGN COIL1	G4NA : Ignition Coil #1/#2/#3/#4, Condenser

No.		Fuse rating	Symbol	Fuse Name	Protected component
FUSE	SENSOR2	SENSOR2	G4FD : Oil Control Valve #1/ #2, Oil Level Sensor, E/R Junction Block (RLY.1, RLY.2) G4NA/G4NC : Oil Control Valve #1/ #2, Camshaft Position Sensor (Intake/Exhaust) Oil Level Sensor (G4NC), E/R Junction Block (RLY.1, RLY.2) D4FD/D4FIII : E/R Junction Block (RLY.1, RLY.2), Diesel Block (PTC Heater Relay#1) Oil Level Sensor, Camshaft Position Sensor, Rail Pressure Regulating Valve, PM Sensor (NEW U)		
	35	20A	<sup>E1</sup> 💭 🕮	ECU1	G4FD/D4FD/D4FIII : ECM G4NA/G4NC : PCM (A/T), ECM (M/T)
	36	10A	<sup>S1</sup> 🛱 🕮	SENSOR1	G4FD : Oxygen Sensor (Up/Down), Variable Intake Solenoid Valve, Purge Control Solenoid Valve G4NA/G4NC : Oxygen Sensor (Up/Down), Variable Intake Solenoid Valve, Purge Control Solenoid Valve D4FD/D4FIII : Air Flow Sensor, Lambda Sensor #1/#2, Oil Pressure Valve

No.	Symbol	Relay Name	Туре
1	1	C/FAN LO RELAY	PLUG MICRO
2	2 £	C/FAN HI RELAY	PLUG MICRO
3	පිරි	BLOWER RELAY	PLUG MICRO
4	J.	HORN RELAY	PLUG MICRO
5	4 (IG2)	PDM 4 (IG2) RELAY	PLUG MICRO
6	$\nabla$	FRONT WIPER RELAY	PLUG MICRO
7	2 (ACC)	PDM 2 (ACC) RELAY	PLUG MICRO
ľ	<b>1</b>	BURGLAR ALARM HORN RELAY	PLUG MICRO
8	°C	START 1 RELAY	PLUG MICRO
9	3 (IG1)	PDM 3 (IG1) RELAY	PLUG MICRO
10	[#]	RR HTD RELAY	PLUG MINI
11	ID	H/LP HI RELAY	PLUG MICRO



Engine compartment sub fuse panel (Diesel Engine - 1.7 VGT)



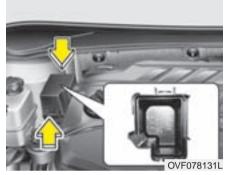
## Engine compartment sub fuse panel

Circuit

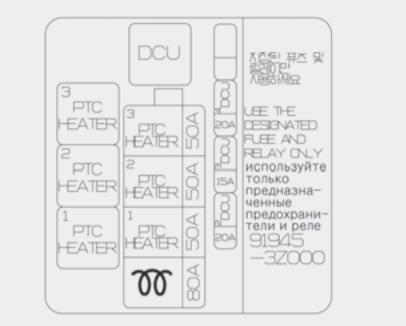
No.	Fuse Name	Fuse rating	Protected component
1	GLOW	80A	Glow Relay Unit
2	PTC HEATER #1	50A	PTC Heater Relay #1
3	PTC HEATER #2	50A	PTC Heater Relay #2
4	PTC HEATER #3	50A	PTC Heater Relay #3

## Relay Type

No.	Relay Name	Relay Type
1	PTC Heater Relay #1	MINI PLUG
2	PTC Heater Relay #2	MINI PLUG
3	PTC Heater Relay #3	MINI PLUG



Engine compartment sub fuse panel (Diesel Engine - Smartstream D1.6)



OVF078130L

## Engine compartment sub fuse panel

Circuit

No.	Fuse Name	Fuse rating	Protected component
1	GLOW	80A	Glow Relay Unit
2	PTC HEATER #1	50A	PTC Heater Relay #1
3	PTC HEATER #2	50A	PTC Heater Relay #2
4	PTC HEATER #3	50A	PTC Heater Relay #3
5	DCU2	20A	Dosing Control Unit
6	DCU3	15A	Dosing Control Unit
7	DCU4	20A	Dosing Control Unit

## Relay Type

No.	Relay Name	Relay Type
1	DCU	MINI PLUG
2	PTC Heater Relay #1	MINI PLUG
3	PTC Heater Relay #2	MINI PLUG
4	PTC Heater Relay #3	MINI PLUG

## LIGHT BULBS

# WARNING - Working on the lights

Prior to working on the light, firmly apply the parking brake, ensure that the ignition switch is turned to the "LOCK" position and turn off the lights to avoid sudden movement of the vehicle and burning your fingers or getting an electric shock.

Use only the bulbs of the specified wattage.

## ! CAUTION

Be sure to replace the burned-out bulb with one of the same wattage rating. Otherwise, it may cause damage to the fuse or electric wiring system.

## ! CAUTION

If you don't have necessary tools, the correct bulbs and the expertise, we recommend that you consult an authorized HYUNDAI dealer. In many cases, it is difficult to replace vehicle light bulbs because other parts of the vehicle must be removed before you can get to the bulb. This is especially true if you have to remove the headlight assembly to get to the bulb(s). Removing/installing the headlight assembly can result in damage to the vehicle.

## **\* NOTICE**

After driving in heavy rain or washing the vehicle, headlight and taillight lenses could appear frosty. This condition is caused by the temperature difference between the lamp inside and outside. This is similar to the condensation on your windows inside your vehicle during rain and does not indicate a problem with your vehicle. If the water leaks into the lamp bulb circuitry, we recommend that the system be checked by an authorized HYUNDAI dealer.

## Maintenance



Headlight, position light, turn signallight and front fog light bulb replacement

### Halogen type

- (1) Headlight (Low)
- (2) Headlight (High)
- (3) Front turn signal light
- (4) Position light / Daytime running light (if equipped)
- (5) Front fog light (if equipped)

### HID type

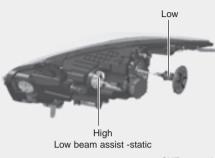
- (1) Headlight (Low/High)
- (2) Low beam assist -static
- (3) Front turn signal light
- (4) Position light / Daytime running light (if equipped)
- (5) Front fog light (if equipped)

## AFS type

- (1) Headlight (Low/High)
- (2) Flashing headlight
- (3) Front turn signal light
- (4) Position light / Daytime running light (if equipped)
- (5) Front fog light (if equipped)

# Headlight (Low/High), Low beam assist - static and turn signal light

- 1. Turn off the engine and open the hood.
- 2. Remove the front bumper.
- 3. Remove the headlight assembly from the body of the vehicle. If you can reach the bulb without removing the headlight assembly, you do not need to do step 2 and 3.
- 4. Disconnect the power connector(s) from the back of the headlight assembly.



OVF075056K

#### Headlight (Low/High) and Low beam assist - static

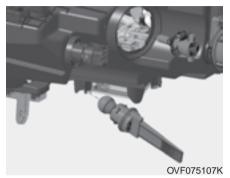
- 5. Remove the headlight bulb cover by turning it counterclockwise.
- 6. Disconnect the headlight bulb socketconnector.
- 7. Remove the socket from the assembly by turning the socket counterclockwise until the tabs on the socket align with the slots on the assembly.
- 8. Pull the bulb out of the socket.
- 9. Insert a new bulb into the socket.
- 10. Install the socket in the assembly by aligning the tabs on the socket with the slots in the assembly. Push the socket into the assembly and turn the socket clockwise.

- 11. Connect the headlight bulb socketconnector
- 12. Install the headlight bulb cover by turning it clockwise.

## **\* NOTICE**

We recommend that the headlight aiming be adjusted after an accident or after the headlight assembly is reinstalled at a authorized HYUNDAI dealer.





# A WARNING - Halogen bulbs

- Halogen bulbs contain pressurized gas that will produce flying pieces of glass if broken.
- · Always handle them carefully, and avoid scratches and abrasions. If the bulbs are lit, avoid contact with liquids. Never touch the glass with bare hands. Residual oil may cause the bulb to overheat and burst when lit. A bulb should be operated only when installed in a headlight.
- If a bulb is damaged or cracked. replace it immediately and carefully dispose of it.
- · Wear eve protection when changing a bulb. Allow the bulb to cool down before handling it.

Turn signal light

Follow the steps 1 to 4 from the previous page.

- 5. Remove the socket from the assembly by turning the socket counterclockwise until the tabs on the socket align with the slots on the assembly.
- 6. Remove the bulb from the socket by pressing it in and rotating it counterclockwise until the tabs on the bulb align with the slots in the socket. Pull the bulb out of the socket
- 7. Insert a new bulb by inserting it into the socket and rotating it until it locks into place.
- 8. Install the socket in the assembly by aligning the tabs on the socket with the slots in the assembly. Push the socket into the assembly and turn the socket clockwise.

### Front fog light bulbs

If the light bulb does not operate, we recommend that you checked an authorized HYUNDAI dealer.

Headlight (HID type), position light and daytime running light (DRL) If the light bulb does not operate, we recommend that you checked an authorized HYUNDAI dealer.

### WARNING - HID Headlight low beam (if equipped)

Do not attempt to replace or inspect the low beam (XENON bulb) due to electric shock danger. If the low beam (XENON bulb) is not working, we recommend that you checked an authorized HYUNDAI dealer.

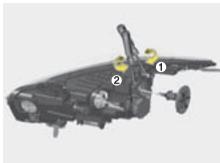
## **\* NOTICE**

HID lamps have superior performance vs. halogen bulbs. HID lamps are estimated by the manufacturer to last twice as long or longer than halogen bulbs depending on their frequency of use. They will probably require replacement at some point in the life of the vehicle. Cycling the headlamps on and off more than typical use will shorten HID lamps life. HID lamps do not fail in the same manner as halogen incandescent lamps. If a headlamp goes out after a period of operation but will immediately relight when the headlamp switch is cycled it is likely the HID lamp needs to be replaced. HID lighting components are more complex than conventional halogen bulbs thus have higher replacement cost.

# Headlight and front fog light aiming (for Europe)

### Headlight aiming

- 1. Inflate the tires to the specified pressure and remove any loads from the vehicle except the driver, spare tire, and tools.
- 2. The vehicle should be placed on a flat floor.
- 3. Draw vertical lines (Vertical lines passing through respective head lamp centers) and a horizontal line (Horizontal line passing through center of head lamps) on the screen.
- 4. With the head lamp and battery in normal condition, aim the head lamps so the brightest portion falls on the horizontal and vertical lines.
- 5. To aim the low beam left or right, turn the driver (1) clockwise or counterclockwise. To aim the low and high beam up or down, turn the driver (2) clockwise or counterclockwise.



8. With the head lamp and battery in normal condition, aim the head lamps so the brightest portion falls on the horizontal and vertical lines.

9. To aim the low beam left or right, turn the driver (1) clockwise or counterclockwise. To aim the low and high beam up or down, turn the driver (2) clockwise or counterclockwise.



OVF075110L

## AFS type

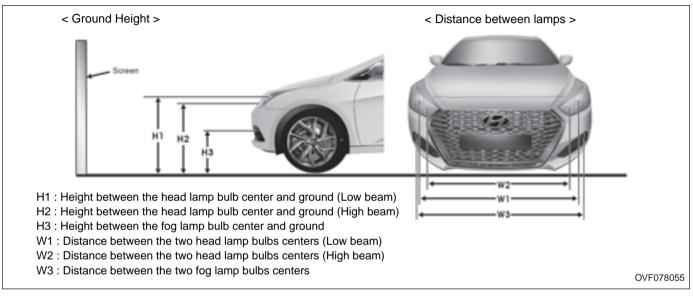
- 1. Turn off the engine
- 2. Turn the light switch to the low beam position.
- 3. Position the tires straight ahead with the steering wheel.
- 4. Turn on the engine.
- 5. Inflate the tires to the specified pressure and remove any loads from the vehicle except the driver, spare tire, and tools.
- 6. The vehicle should be placed on a flat floor.
- 7. Draw vertical lines (Vertical lines passing through respective head lamp centers) and a horizontal line (Horizontal line passing through center of head lamps) on the screen.

OVF078051L

## Front fog light aiming

The front fog lamp can be aimed as the same manner of the head lamps aiming. With the front fog lamps and battery normal condition, aim the front fog lamps. To aim the front fog lamp up or down, turn the driver (1) clockwise or counterclockwise.

### Aiming point



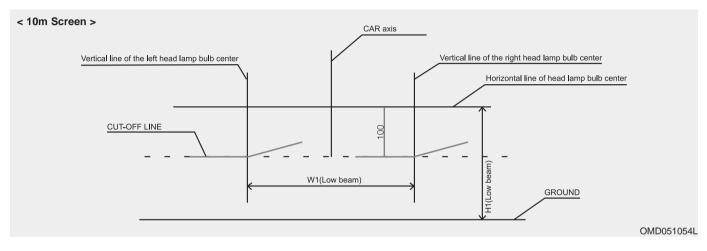
Sedan

Wagon Unit: mm (ir									
Vehicle condition	H1	H2	H3	W1	W2	W3			
Without	719	691	343	1460	1214	1331			
driver	(28.3)	(27.2)	(13.5)	(574.8)	(477.9)	(52.4)			
With driver	714	686	338	1460	1214	1331			
	(28.1)	(27.0)	(13.3)	(574.8)	(477.9)	(52.4)			

Vehicle condition	H1	H2	H3	W1	W2	W3
Without	725	697	348	1460	1214	1331
driver	(28.5)	(27.4)	(13.7)	(574.8)	(477.9)	(52.4)
With driver	720	692	343	1460	1214	1331
	(28.3)	(27.2)	(13.5)	(574.8)	(477.9)	(52.4)

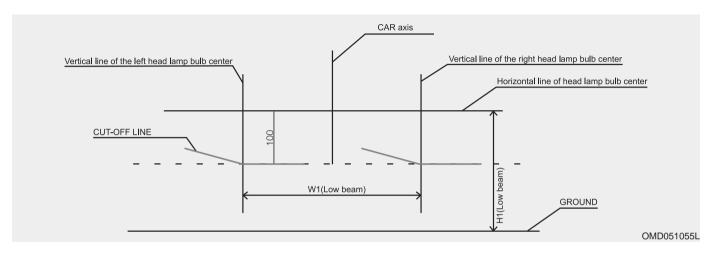
Unit: mm (in)

Wagon



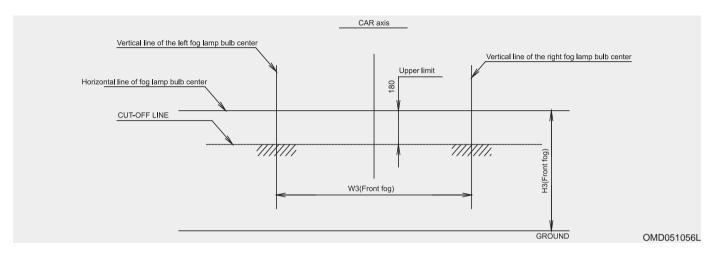
Head lamp low beam (driver's side)

- 1. Turn the low beam on without driver aboard.
- 2. The cut-off line should be projected in the cut-off line shown in the picture.
- 3. When aiming the low beam, vertical aiming should be adjusted after adjusting the horizontal aiming.
- 4. If head lamp leveling device is equipped, adjust the head lamp leveling device switch with 0 positions.



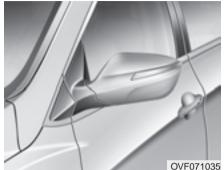
Head lamp low beam (front passenger's side)

- 1. Turn the low beam on without driver aboard.
- 2. The cut-off line should be projected in the cut-off line shown in the picture.
- 3. When aiming the low beam, vertical aiming should be adjusted after adjusting the horizontal aiming.
- 4. If head lamp leveling device is equipped, adjust the head lamp leveling device switch with 0 positions.



## Front fog light

- 1. Turn the front fog lamp on without the driver aboard.
- 2. The cut-off line should be projected in the allowable range (shaded region).



OVF07103

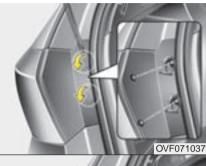
# Side repeater light bulb replacement

If the light bulb does not operate, we recommend that you checked an authorized HYUNDAI dealer.



Rear combination light bulb replacement (wagon)

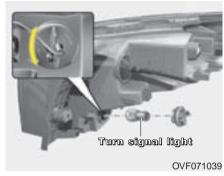
- (1) Tail light / Stop light
- (2) Tail light
- (3) Rear turn signal light
- (4) Back-up light
- (5) Rear fog light (if equipped)





Outside light Rear turn signal light 1. Turn off the engine. 2. Open the tailgate. 3. Remove the cover.

- 4. Loosen the light assembly retaining screws with a cross-tip screwdriver.
- 5. Remove the rear combination light assembly from the body of the vehicle.



- 6. Remove the socket from the assembly by turning the socket counterclockwise until the tabs on the socket align with the slots on the assembly.
- 7. Remove the bulb from the socket by pressing it in and rotating it counterclockwise until the tabs on the bulb align with the slots in the socket. Pull the bulb out of the socket.
- 8. Insert a new bulb by inserting it into the socket and rotating it until it locks into place.
- 9. Install the socket in the assembly by aligning the tabs on the socket with the slots in the assembly. Push the socket into the assembly and turn the socket clockwise.
- 10. Reinstall the light assembly to the body of the vehicle.

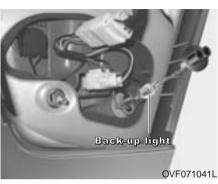
### Stop and tail light

If the light bulb does not operate, we recommend that you checked an authorized HYUNDAI dealer.



### Inside light

- 1. Turn off the engine.
- 2. Open the tailgate.
- 3. Remove the service cover using a flatblade screwdriver.



### **Back-up light**

- Remove the socket from the assembly by turning the socket counterclockwise until the tabs on the socket align with the slots on the assembly.
- 5. Remove the bulb from the socket by pressing it in and rotating it counterclockwise until the tabs on the bulb align with the slots in the socket. Pull the bulb out of the socket.
- 6. Insert a new bulb by inserting it into the socket and rotating it until it locks into place.

- Install the socket in the assembly by aligning the tabs on the socket with the slots in the assembly. Push the socket into the assembly and turn the socket clockwise.
- 8. Install the service cover by putting it into the service hole.



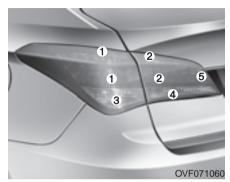
#### Tail light

If the light bulb does not operate, we recommend that you checked an authorized HYUNDAI dealer

OVF071041

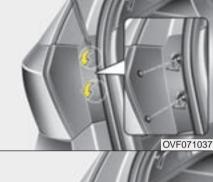
### Rear fog light

- 4. Remove the bulb-socket from the assembly by turning the socket counter clockwise until the tabs on the socket align with the slots on the assembly.
- 5. Install the new bulb-socket into the assembly by aligning the tabs on the socket with the slots in the housing. Push the socket into the assembly and turn the socket clockwise.



## Rear combination light bulb replacement (sedan)

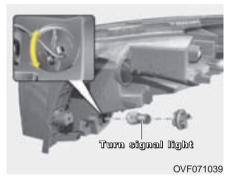
- (1) Tail light / Stop light
- (2) Tail light or
  - Tail light / Stop light (if equipped)
- (3) Rear turn signal light
- (4) Back-up light
- (5) Rear fog light (if equipped)





### **Outside light**

- 1. Turn off the engine.
- 2. Open the trunk lid.
- 3. Remove the cover.
- 4. Loosen the light assembly retaining screws with a cross-tip screwdriver.
- 5. Remove the rear combination light assembly from the body of the vehicle.



### Rear turn signal light

- 6. Remove the socket from the assembly by turning the socket counterclockwise until the tabs on the socket align with the slots on the assembly.
- 7. Remove the bulb from the socket by pressing it in and rotating it counterclockwise until the tabs on the bulb align with the slots in the socket. Pull the bulb out of the socket.
- 8. Insert a new bulb by inserting it into the socket and rotating it until it locks into place.

- Install the socket in the assembly by aligning the tabs on the socket with the slots in the assembly. Push the socket into the assembly and turn the socket clockwise.
- 10. Reinstall the light assembly to the body of the vehicle.

7 94

### Stop and tail light

If the light bulb does not operate, we recommend that you checked an authorized HYUNDAI dealer.



Inside light

- 1. Turn off the engine.
- 2. Open the trunk.
- 3. Loosen the retaining screw of the trunk lid cover and then remove the cover.



### **Back-up light**

- 4. Remove the socket from the assembly by turning the socket counterclockwise until the tabs on the socket align with the slots on the assembly.
- 5. Remove the bulb from the socket by pressing it in and rotating it counterclockwise until the tabs on the bulb align with the slots in the socket. Pull the bulb out of the socket.
- 6. Insert a new bulb by inserting it into the socket and rotating it until it locks into place.

### Maintenance

- 7. Install the socket in the assembly by aligning the tabs on the socket with the slots in the assembly. Push the socket into the assembly and turn the socket clockwise.
- Reinstall the trunk lid cover by pushing in the screw.

### Rear fog light

- 4. Remove the bulb-socket from the assembly by turning the socket counter clockwise until the tabs on the socket align with the slots on the assembly.
- Install the new bulb-socket into the assembly by aligning the tabs on the socket with the slots in the housing. Push the socket into the assembly and turn the socket clockwise.
- Reinstall the trunk lid cover by pushing in the screw.

### Tail light

If the light bulb does not operate, we recommend that you checked an authorized HYUNDAI dealer.

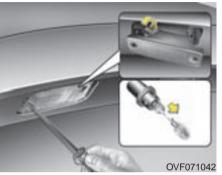


Sedan



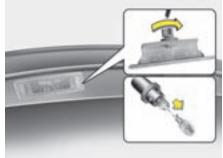
## High mounted stop light bulb replacement

If the light bulb does not operate, we recommend that you checked an authorized HYUNDAI dealer.



License plate light bulb replacement (wagon)

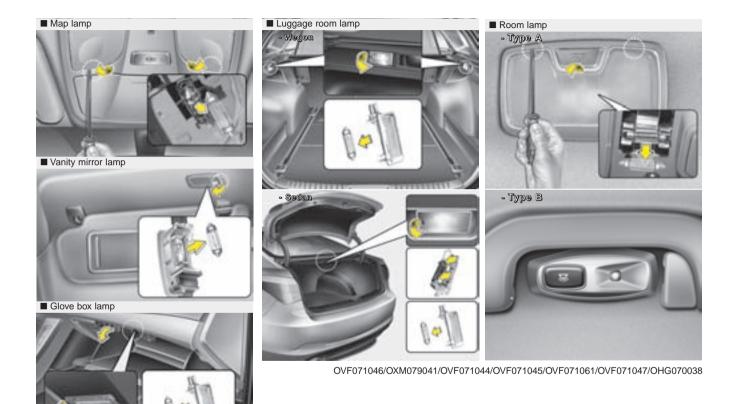
- 1. Turn off the engine.
- 2. Loosen the retaining screws with a philips head screwdriver.
- 3. Remove the bulb assembly by turning it counterclockwise.
- 4. Remove the bulb by pulling it straight out.
- 5. Install a new bulb.
- 6. Reinstall the bulb assembly securely with the retaining screws.



OVF071064

### License plate light bulb replacement (sedan)

- 1. Turn off the engine.
- 2. Remove the lens while pushing in the clip with a slim tool.
- 3. Remove the bulb assembly by turning it counterclockwise.
- 4. Remove the bulb by pulling it straight out.
- 5. Install a new bulb.
- 6. Reinstall in the reverse order.



7 98

### Interior light bulb replacement

Map lamp, vanity mirror lamp, room lamp (type A), luggage room lamp (wagon) and glove box lamp

- 1. Using a flat-blade screwdriver, gently pry the lens from the interior light housing.
- 2. Remove the bulb by pulling it straight out.

## A WARNING

Prior to working on the Interior Lights, ensure that the light is off to avoid burning your fingers or receiving an electric shock.

- 3. Install a new bulb in the socket.
- 4. Align the lens tabs with the interior light housing notches and snap the lens into place.

## . CAUTION

Be careful not to dirty or damage lens, lens tab, and plastic housings.

### Room lamp (type B)

If the light bulb does not operate, we recommend that you checked an authorized HYUNDAI dealer.

### Luggage room lamp (sedan)

- 1. Using a flat-blade screwdriver, gently pry the lens from the interior light housing.
- 2. Pull out the cover while pressing the clip.
- 3. Remove the bulb by pulling it straight out.
- 4. Install a new bulb in the socket.
- 5. Reinstall in the reverse order.

## **APPEARANCE CARE**

### Exterior care

### Exterior general caution

It is very important to follow the label directions when using any chemical cleaner or polish. Read all warning and caution statements that appear on the label.

### High-pressure washing

• When using high-pressure washers, make sure to maintain sufficient distance from the vehicle.

Insufficient clearance or excessive pressure can lead to component damage or water penetration.

- Do not spray the camera, sensors or its surrounding area directly with a high pressure washer. Shock applied from high pressure water may cause the device to not operate normally.
- Do not bring the nozzle tip close to boots (rubber or plastic covers) or connectors as they may be damaged if they come into contact with high pressure water.

### Finish maintenance

### Washing

To help protect your vehicle's finish from rust and deterioration, wash it thoroughly and frequently at least once a month with lukewarm or cold water.

If you use your vehicle for off-road driving, you should wash it after each offroad trip. Pay special attention to the removal of any accumulation of salt, dirt, mud, and other foreign materials. Make sure the drain holes in the lower edges of the doors and rocker panels are kept clear and clean.

Insects, tar, tree sap, bird droppings, industrial pollution and similar deposits can damage your vehicle's finish if not removed immediately.

Even prompt washing with plain water may not completely remove all these deposits.

A mild soap, safe for use on painted surfaces, may be used.

After washing, rinse the vehicle thoroughly with lukewarm or cold water. Do not allow soap to dry on the finish.

## ! CAUTION

- Do not use strong soap, chemical detergents or hot water, and do not wash the vehicle in direct sunlight or when the body of the vehicle is warm.
- Be careful when washing the side windows of your vehicle.

Especially, with high-pressure water, water may leak through the windows and wet the interior.

• To prevent damage to the plastic parts and lamps, do not clean with chemical solvents or strong detergents.

## A WARNING - Wet brakes

After washing the vehicle, test the brakes while driving slowly to see if they have been affected by water. If braking performance is impaired, dry the brakes by applying them lightly while maintaining a slow forward speed.



## . CAUTION

- Water washing in the engine compartment including high pressure water washing may cause the failure of electrical circuits located in the engine compartment.
- Never allow water or other liquids to come in contact with electrical/electronic components and air duct inside the vehicle as this may damage them.

### Waxing

Wax the vehicle when water will no longer bead on the paint.

Always wash and dry the vehicle before waxing. Use a good quality liquid or paste wax, and follow the manufacturer's instructions. Wax all metal trim to protect it and to maintain its luster.

Removing oil, tar, and similar materials with a spot remover will usually strip the wax from the finish. Be sure to re-wax these areas even if the rest of the vehicle does not yet need waxing.

## ! CAUTION

- Wiping dust or dirt off the body with a dry cloth will scratch the finish.
- Do not use steel wool, abrasive cleaners, or strong detergents containing highly alkaline or caustic agents on chrome-plated or anodized aluminum parts. This may result in damage to the protective coating and cause discoloration or paint deterioration.

### Finish damage repair

Deep scratches or stone chips in the painted surface must be repaired promptly. Exposed metal will quickly rust and may develop into a major repair expense.

### **\*** NOTICE

If your vehicle is damaged and requires any metal repair or replacement, be sure the body shop applies anti-corrosion materials to the parts repaired or replaced.

### Bright-metal maintenance

- To remove road tar and insects, use a tar remover, not a scraper or other sharp object.
- To protect the surfaces of bright-metal parts from corrosion, apply a coating of wax or chrome preservative and rub to a high luster.
- During winter weather or in coastal areas, cover the bright metal parts with a heavier coating of wax or preservative. If necessary, coat the parts with non-corrosive petroleum jelly or other protective compound.

### Underbody maintenance

Corrosive materials used for ice and snow removal and dust control may collect on the underbody. If these materials are not removed, accelerated rusting can occur on underbody parts such as the fuel lines, frame, floor pan and exhaust system, even though they have been treated with rust protection.

Thoroughly flush the vehicle underbody and wheel openings with lukewarm or cold water once a month, after off-road driving and at the end of each winter. Pay special attention to these areas because it is difficult to see all the mud and dirt. It will do more harm than good to wet down the road grime without removing it. The lower edges of doors, rocker panels, and frame members have drain holes that should not be allowed to clog with dirt; trapped water in these areas can cause rusting.

## A WARNING

After washing the vehicle, test the brakes while driving slowly to see if they have been affected by water. If braking performance is impaired, dry the brakes by applying them lightly while maintaining a slow forward speed.

#### Aluminum wheel maintenance

The aluminum wheels are coated with a clear protective finish.

- Do not use any abrasive cleaner, polishing compound, solvent, or wire brushes on aluminum wheels. They may scratch or damage the finish.
- Clean the wheel when it has cooled.
- Use only a mild soap or neutral detergent, and rinse thoroughly with water. Also, be sure to clean the wheels after driving on salted roads. This helps prevent corrosion.
- Avoid washing the wheels with highspeed car wash brushes.
- Do not use any alkaline or acid detergent. It may damage and corrode the aluminum wheels coated with a clear protective finish.

### Corrosion protection

### Protecting your vehicle from corrosion

By using the most advanced design and construction practices to combat corrosion, we produce cars of the highest quality. However, this is only part of the job. To achieve the long-term corrosion resistance your vehicle can deliver, the owner's cooperation and assistance is also required.

#### **Common causes of corrosion**

The most common causes of corrosion on your car are:

- Road salt, dirt and moisture that is allowed to accumulate underneath the car.
- Removal of paint or protective coatings by stones, gravel, abrasion or minor scrapes and dents which leave unprotected metal exposed to corrosion.

### **High-corrosion** areas

If you live in an area where your car is regularly exposed to corrosive materials, corrosion protection is particularly important. Some of the common causes of accelerated corrosion are road salts, dust control chemicals, ocean air and industrial pollution.

#### Moisture breeds corrosion

Moisture creates the conditions in which corrosion is most likely to occur. For example, corrosion is accelerated by high humidity, particularly when temperatures are just above freezing. In such conditions, the corrosive material is kept in contact with the car surfaces by moisture that is slow to evaporate. Mud is particularly corrosive because it is slow to dry and holds moisture in contact with the vehicle. Although the mud appears to be dry, it can still retain the moisture and promote corrosion.

High temperatures can also accelerate corrosion of parts that are not properly ventilated so the moisture can be dispersed. For all these reasons, it is particularly important to keep your car clean and free of mud or accumulations of other materials. This applies not only to the visible surfaces but particularly to the underside of the car.

#### To help prevent corrosion

You can help prevent corrosion from getting started by observing the following:

### Keep your car clean

The best way to prevent corrosion is to keep your car clean and free of corrosive materials. Attention to the underside of the car is particularly important.

 If you live in a high-corrosion area where road salts are used, near the ocean, areas with industrial pollution, acid rain, etc.—, you should take extra care to prevent corrosion. In winter, hose off the underside of your car at least once a month and be sure to clean the underside thoroughly when winter is over.

- When cleaning underneath the car, give particular attention to the components under the fenders and other areas that are hidden from view. Do a thorough job; just dampening the accumulated mud rather than washing it away will accelerate corrosion rather than prevent it. Water under high pressure and steam are particularly effective in removing accumulated mud and corrosive materials.
- When cleaning lower door panels, rocker panels and frame members, be sure that drain holes are kept open so that moisture can escape and not be trapped inside to accelerate corrosion.

### Keep your garage dry

Don't park your car in a damp, poorly ventilated garage. This creates a favorable environment for corrosion. This is particularly true if you wash your car in the garage or drive it into the garage when it is still wet or covered with snow, ice or mud. Even a heated garage can contribute to corrosion unless it is well ventilated so moisture is dispersed.

#### Keep paint and trim in good condition

Scratches or chips in the finish should be covered with "touch-up" paint as soon as possible to reduce the possibility of corrosion. If bare metal is showing through, the attention of a qualified body and paint shop is recommended.

Bird droppings : Bird droppings are highly corrosive and may damage painted surfaces in just a few hours. Always remove bird droppings as soon as possible.

### Don't neglect the interior

Moisture can collect under the floor mats and carpeting to cause corrosion. Check under the mats periodically to be sure the carpeting is dry. Use particular care if you carry fertilizers, cleaning materials or chemicals in the car.

These should be carried only in proper containers and any spills or leaks should be cleaned up, flushed with clean water and thoroughly dried.

### Interior care

### Interior general precautions

Prevent chemicals such as perfume, cosmetic oil, sun cream, hand cleaner, and air freshener from contacting the interior parts because they may cause damage or discoloration. If they do contact the interior parts, wipe them off immediately. See the instructions that follow for the proper way to clean vinyl.

## ! CAUTION

Never allow water or other liquids to come in contact with electrical/electronic components inside the vehicle as this may damage them.

### ! CAUTION

When cleaning leather products (steering wheel, seats etc.), use neutral detergents or low alcohol content solutions. If you use high alcohol content solutions or acid/alkaline detergents, the color of the leather may fade or the surface may get stripped off.

## Cleaning the upholstery and interior trim

### Vinyl (if equipped)

Remove dust and loose dirt from vinyl with a whisk broom or vacuum cleaner. Clean vinyl surfaces with a vinyl cleaner.

### Fabric (if equipped)

Remove dust and loose dirt from fabric with a whisk broom or vacuum cleaner. Clean with a mild soap solution recommended for upholstery or carpets. Remove fresh spots immediately with a fabric spot cleaner. If fresh spots do not receive immediate attention, the fabric can be stained and its color can be affected. Also, its fireresistant properties can be reduced if the material is not properly maintained.

## ! CAUTION

Using anything but recommended cleaners and procedures may affect the fabric's appearance and fireresistant properties.

Leather (if equipped)

- Feature of Seat Leather
  - Leather is made from the outer skin of an animal, which goes through a special process to be available for use. Since it is a natural object, each part differs in thickness or density.

Wrinkles may appear as a natural result of stretching and shrinking depending on the temperature and humidity.

- The seat is made of stretchable fabric to improve comfort.
- The parts contacting the body are curved and the side supporting area is high which provides driving comfort and stability.
- Wrinkles may appear naturally from usage. It is not a fault of the products.

## ! CAUTION

- Wrinkles or abrasions which appear naturally from usage are not covered by warranty.
- Belts with metallic accessories, zippers or key inside the back pocket may damage the seat fabric.
- Make sure not to wet the seat. It may change the nature of natural leather.
- Jeans or clothes which could bleach may contaminate the surface of the seat covering fabric.

- Caring for the leather seats
  - Vacuum the seat periodically to remove dust and sand on the seat. It will prevent abrasion or damage of the leather and maintain its quality.
  - Wipe the natural leather seat cover often with dry or soft cloth.
  - Use of proper leather protective may prevent abrasion of the cover and helps maintain the color. Be sure to read the instructions and consult a specialist when using leather coating or protective agent.
  - Light colored (beige, cream beige) leather is easily contaminated and the stain is noticeable. Clean the seats frequently.
  - Avoid wiping with wet cloth. It may cause the surface to crack.

- Cleaning the leather seats
  - Remove all contaminations instantly. Refer to instructions below for removal of each contaminant.
  - Cosmetic products (sunscreen, foundation, etc.)

Apply cleansing cream on a cloth and wipe the contaminate spot. Wipe off the cream with a wet cloth and remove water with a dry cloth.

- Beverages (coffee, soft drink, etc.) Apply a small amount of neutral detergent and wipe until contaminations do not smear.
- Oil

Remove oil instantly with absorbable cloth and wipe with stain remover used only for natural leather.

- Chewing gum

Harden the gum with ice and remove gradually.

#### Cleaning the lap/shoulder belt webbing

Clean the belt webbing with any mild soap solution recommended for cleaning upholstery or carpet. Follow the instructions provided with the soap. Do not bleach or re-dye the webbing because this may weaken it.

#### Cleaning the interior window glass

If the interior glass surfaces of the vehicle become fogged (that is, covered with an oily, greasy or waxy film), they should be cleaned with glass cleaner. Follow the directions on the glass cleaner container.

### .! CAUTION

Do not scrape or scratch the inside of the rear window. This may result in damage to the rear window defroster grid.

### **EMISSION CONTROL SYSTEM**

The emission control system of your vehicle is covered by a written limited warranty. Please see the warranty information contained in the Service Passport in your vehicle.

Your vehicle is equipped with an emission control system to meet all emission regulations.

There are three emission control systems which are as follows.

- (1) Crankcase emission control system
- (2) Evaporative emission control system
- (3) Exhaust emission control system

In order to assure the proper function of the emission control systems, it is recommended that you have your car inspected and maintained by an authorized HYUNDAI dealer in accordance with the maintenance schedule in this manual. Caution for the Inspection and Maintenance Test (With Electronic Stability Control (ESC) system)

- To prevent the vehicle from misfiring during dynamometer testing, turn the Electronic Stability Control (ESC) system off by pressing the ESC switch.
- After dynamometer testing is completed, turn the ESC system back on by pressing the ESC switch again.

## 1. Crankcase emission control system

The positive crankcase ventilation system is employed to prevent air pollution caused by blow-by gases being emitted from the crankcase. This system supplies fresh filtered air to the crankcase through the air intake hose. Inside the crankcase, the fresh air mixes with blow-by gases, which then pass through the PCV valve into the induction system.

### 2. Evaporative emission control System

The Evaporative Emission Control System is designed to prevent fuel vapors from escaping into the atmosphere.

### Canister

Fuel vapors generated inside the fuel tank are absorbed and stored in the onboard canister. When the engine is running, the fuel vapors absorbed in the canister are drawn into the surge tank through the purge control solenoid valve.

### Purge Control Solenoid Valve (PCSV)

The purge control solenoid valve is controlled by the Engine Control Module (ECM); when the engine coolant temperature is low during idling, the PCSV closes so that evaporated fuel is not taken into the engine. After the engine warmsup during ordinary driving, the PCSV opens to introduce evaporated fuel to the engine.

## 3. Exhaust emission control system

The Exhaust Emission Control System is a highly effective system which controls exhaust emissions while maintaining good vehicle performance.

### Vehicle modifications

This vehicle should not be modified. Modification of your vehicle could affect its performance, safety or durability and may even violate governmental safety and emissions regulations.

In addition, damage or performance problems resulting from any modification may not be covered under warranty.

• If you use unauthorized electronic devices, it may cause the vehicle to operate abnormally, wire damage, battery discharge or fire. For your safety, do not use unauthorized electric devices.

Engine exhaust gas precautions (carbon monoxide)

 Carbon monoxide can be present with other exhaust fumes. Therefore, if you smell exhaust fumes of any kind inside your vehicle, have it inspected and repaired immediately. If you ever suspect exhaust fumes are coming into your vehicle, drive it only with all the windows fully open. Have your vehicle checked and repaired immediately.

### **A** WARNING - Exhaust

Engine exhaust gases contain carbon monoxide (CO). Though colorless and odorless, it is dangerous and could be lethal if inhaled. Follow the instructions following to avoid CO poisoning.

- Do not operate the engine in confined or closed areas (such as garages) any more than what is necessary to move the vehicle in or out of the area.
- When the vehicle is stopped in an open area for more than a short time with the engine running, adjust the ventilation system (as needed) to draw outside air into the vehicle.
- Never sit in a parked or stopped vehicle for any extended time with the engine running.
- When the engine stalls or fails to start, excessive attempts to restart the engine may cause damage to the emission control system.

Operating precautions for catalytic converters (if equipped)

## A WARNING - Fire

- A hot exhaust system can ignite flammable items under your vehicle. Do not park, idle, or drive the vehicle over or near flammable objects, such as dry grass, paper, leaves, etc.
- The exhaust system and catalytic system are very hot while the engine is running or immediately after the engine is turned off. Keep away from the exhaust system and catalytic, you may get burned.

Also, do not remove the heat sink around the exhaust system, do not seal the bottom of the vehicle or do not coat the vehicle for corrosion control. It may present a fire risk under certain conditions. Your vehicle is equipped with a catalytic converter emission control device.

Therefore, the following precautions must be observed:

- Make sure to refuel your vehicle according to the "Fuel requirements" suggested in section 1.
- Do not operate the vehicle when there are signs of engine malfunction, such as misfire or a noticeable loss of performance.
- Do not misuse or abuse the engine. Examples of misuse are coasting with the ignition off and descending steep grades in gear with the ignition off.
- Do not operate the engine at high idle speed for extended periods (5 minutes or more).
- Do not modify or tamper with any part of the engine or emission control system. We recommend that the system be inspected by an authorized HYUNDAI dealer.

• Avoid driving with a extremely low fuel level. Running out of fuel cause the engine to misfire, damaging the catalytic converter.

Failure to observe these precautions could result in damage to the catalytic converter and to your vehicle.

Additionally, such actions could void your warranties.

#### Diesel Particulate Filter (if equipped)

The Diesel Particulate Filter (DPF) system removes the soot in the exhaust gas. Unlike a disposable air filter, the DPF system automatically burns (oxidizes) and removes the accumulated soot according to the driving condition. In other words, the active burning by engine control system and high exhaust gas temperature caused by normal/high driving condition burns and removes the accumulated soot.

When the malfunction indicator light illuminates, it may turn-off after driving the vehicle at more than 60km/h (37 mph) or at more than second gear with 1500~2500 engine rpm for a certain time (for about 25 minutes).

If you continue to drive with the malfunction indicator light blinking for a long time, the DPF system can be damaged and fuel consumption can be worsen and the engine durability can be worsen by oil dilution.

### .! CAUTION - Diesel Fuel (if equipped with DPF)

It is recommended to use the regulated automotive diesel fuel for diesel vehicle equipped with the DPF system.

If you use diesel fuel including high sulfur (more than 50 ppm sulfur) and unspecified additives, it can cause the DPF system to be damaged and white smoke can be emitted.

## Gasoline particulate filter (GPF) (if equipped)

The Gasoline Particulate Filter (GPF) system removes the soot in the exhaust gas.

The GPF system automatically burns (or oxidizes) the accumulated soot in accordance with driving situations, unlike a disposable air filter.

In other words, the accumulated soot is automatically purged out by the engine control system and by the high exhaustgas temperature at normal/ high driving speeds.

However, when the vehicle is continually driven at repeated short distances or driven at low speed for a long time, the accumulated soot may not be automatically removed because of low exhaust gas temperature.

### .! CAUTION - Gasoline Fuel (if equipped with GPF)

We recommend you to use only the regulated gasoline fuels, when your vehicle is equipped with the GPF system.

When you use other gasoline fuels, which are high in sulfurs (above 50 ppm) or that contain unspecified additives, they may damage the GPF system and cause white smoke emissions.

### Lean NOx Trap (if equipped)

The Lean NOx Trap (LNT) system removes the nitrogen oxide in the exhaust gas. The smell can occur in the exhaust gas depending on the quality of the fuel and it can degrade NOx reduction performance, please use the regulated automotive diesel fuel.

## Selective Catalytic Reduction (if equipped)

The Selective Catalytic Reduction (SCR) system is to catalytically convert NOx to Nitrogen and Water by using the reduction agent, the urea solution.



### Urea gauge (if equipped)

The urea solution gauge indicates the approximate amount of remaining urea solution inside the urea solution tank.

\* The urea gauge image pops up, whenever the ignition switch is pressed to the ON position.



### Low urea warning message (if equipped)

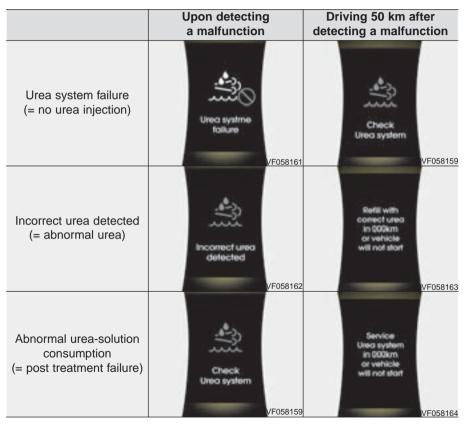
The lack warning messages of Urea appear below Urea 5.4 liter. When the warning message "Low Urea" is displayed with SCR warning lamp ( $\stackrel{()}{\longrightarrow}$ ), the urea tank needs to be refilled. If not refilled for a considerable mileage, visual warning system will escalate the intensity by displaying the message "Refill Urea" with SCR warning lamp ( $\stackrel{()}{\Longrightarrow}$ ).

In this case, the tank soon needs to be refilled. The remaining urea in the tank approaches to too low level the warning message "Refill Urea tank or vehicle will not start" with SCR warning lamp ( (1). "xxx km(mile)" represents the remaining travel distance allowed, so do not continue driving to the limit of the remaining travel distance without refilling.

Otherwise, the vehicle can't be restarted once the engine is turned off by ignition key. Based on the driving pattern, environmental condition and road profile, the deducted remaining mileage may differ from the actual travel distance.

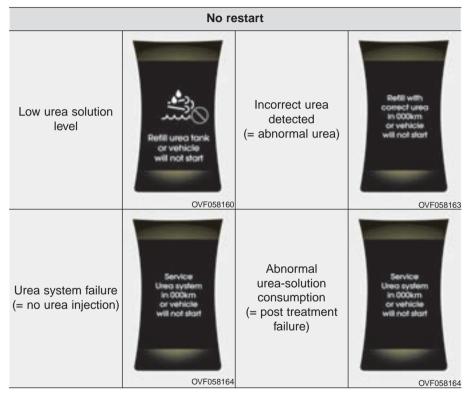
When "Low Urea" or "Refill Urea" message is displayed, add enough urea. When "Refill Urea tank or vehicle will not start" message is displayed, fill up enough urea. When "Refill Urea tank or vehicle will not start" message is displayed with SCR warning lamp ( 🚖 ), the vehicle can't be restarted once the engine is turned off by ignition key. For the above cases, full replenishment is always recommended.

Malfunction with the SCR system (if equipped)



SCR system has malfunction due to disconnected electrical components, incorrect urea and so on.

"xxx km(mile)" represents the remaining travel distance allowed, so do not continue driving to the limit of the remaining travel distance without fixing the source of the malfunction. Otherwise, the vehicle can't be restarted once the engine is turned off by ignition key. In this case, we recommend that the system be inspected by an authorized HYUNDAI dealer. *Clearing the vehicle-restarting restriction (if equipped)* 



Once the inducement system reached to final status and disabled the vehicle restart, it will only be deactivated in case the urea tank is replenished or the malfunctions have been rectified. If the vehicle can't be restarted with "Refill Urea tank or vehicle will not start" message, refill enough urea, wait for minutes and try vehicle starting again. If vehicle starting is not possible regardless of urea level, we recommend that the system be inspected by an authorized HYUNDAI dealer.



\* Never use the urea solution mixture with additives or water. It may allow foreign substances to enter the urea solution tank. If so, it surely applies adverse impact on the vehicle performance, causing various malfunctions.

- ✤ Use only the ISO 22241-specified urea solution. Any unauthorized urea solution surely applies adverse impacts on the vehicle performance, causing various malfunctions.
- 4. Turn the urea solution tank cap in a clockwise direction to securely close it.

To refill the urea solution from the refill bottle

- 1. Press the ignition switch to the OFF position
- 2. Turn the urea solution tank cap in a counterclockwise direction to open it.
- 3. Fully add the ISO 22241-specified urea solution or above the mark on the urea solution tank.
  - Pay the great caution not to add the urea solution into the fuel tank. If not, it surely applies adverse impact on the vehicle performance, causing various malfunctions.
  - Pay the great caution not to over-fill the (completely) fulfilled urea solution tank by force while refilling the urea solution from the refill bottle. The over-filled urea solution tank will be expanded when it becomes frozen and this can cause a serious malfunction of the urea solution tank or urea solution system.
  - \* Never use the urea solution mixture with additives or water. It may allow foreign substances to enter the urea solution tank. If so, it surely applies adverse impact on the vehicle performance, causing various malfunctions.

Adding the urea solution To refill the urea solution from the refill hose

- 1. Press the ignition switch to the OFF position.
- 2. Turn the urea solution tank cap in a counterclockwise direction to open it.
- 3. Fully insert the refill hose to fully add the ISO 22241-specified urea solution or above the mark on the urea solution tank.
  - Pay the great caution not to add the urea solution into the fuel tank. If not, it surely applies adverse impact on the vehicle performance, causing various malfunctions.

- ✤ Use only the ISO 22241-specified urea solution. Any unauthorized urea solution surely applies adverse impacts on the vehicle performance, causing various malfunctions.
- 4. Turn the urea solution tank cap in a clockwise direction to securely close it.

Adding the urea solution: Every approximately 5,600 km (The urea solution consumption is dependent on the road profile, driving pattern and environmental condition)

✤ It takes some time to update the cluster gauges after the UREA injection.

## 

- Do not apply any external impact on the DPF system. It may damage the catalyst, which is equipped inside the DPF system.
- Do not arbitrarily modify or manipulate the DPF system by redirecting or lengthen the exhaust pipe. It may adversely impact the DPF system.
- Avoid contact with the drained water from the exhaust pipe. The water is slightly acid and harmful to skin. If contacted, thoroughly wash it.
- Any arbitrary manipulation or modification of the DPF system may cause a system malfunction. The DPF system is controlled by the complex device.
- Wait for the DPF system to cool down before the maintenance service, as it is hot due to the heat generation. Otherwise, it may case a skin burn.

(Continued)

### (Continued)

- Add only the specified urea solution, when your vehicle is equipped with the urea solution system.
- The urea solution system (i.e. urea solution nozzle, urea solution pump, and DCU) operates for approximately 2 minutes more to eliminate the remaining urea solution inside, even after the ignition switch is pressed to the OFF position. Before the maintenance service, make sure that the urea solution system is completely turned OFF.
- The poor urea solution or the unauthorized liquids may damage the vehicle components, including the DPF system. Any unverified additives in the urea solution may clog the SCR catalyst and cause other malfunctions, which require the expensive DPF system to be replaced.

(Continued)

### (Continued)

- When the urea solution contacts with the eyes or the skin, you should thoroughly wash the contaminated skin area. .
- When you swallow the urea solution, thoroughly rinse your mouth and drink a lot of fresh water. Then, immediately consult a doctor.
- When your cloth is contaminated with the urea solution, immediately change your cloth.
- When you have an allergic reaction to the urea solution, immediately consult a doctor.
- Do not allow a child to contact the urea solution.
- Wipe off any urea solution spillage with water or cloth. When the urea solution is crystalized, wipe it off with the sponge or the cloth, which is dampened in the cold water. When the urea solution spillage is exposed in the air for an extended period of time, it is crystalized in white, damaging the vehicle surface.

(Continued)

### (Continued)

- The urea solution is not the fuel additives. Thus, it should not be injected to the fuel tank. Otherwise, it may damage the engine.
- The urea solution is the aqueous solution, which is inflammable, non-toxic, colorless and odorless.
- Store the urea solution tank only in the well-ventilated locations. When the urea solution is exposed to the hot temperature at approximately 50°C for an extended period of time (i.e. under the direct sunlight), the chemical decomposition may occur, emitting the ammonia vapor.

### Storing the urea solution

- It is improper to store the urea solution in the containers made with the certain materials (i.e. aluminum, copper, copper alloy, non-alloyed still, and galvanized steel). The urea solution dissolves the metal materials, severely damaging the exhaust purification system to be non-repairable.
- Store the urea solution only in the containers made with the following materials. (DIN EN 10 088-1-/-2-/-3-specified CR-Ni steel, Mo-Cr-Ni steel, polypropylene, and polyethylene)

### Urea solution purity

- The following situations may damage the DPF system.
  - Fuels or any unauthorized liquids are added into the urea solution tank.
  - Additives are mixed in the urea solution.
  - Water is added to dilute the urea solution.
- Use only the ISO 22241- or DIN7007O-specified urea solution. When any unauthorized urea solution is added to the tank, we recommend you to contact an authorized HYUNDAI dealer.
- When any unauthorized impurities enter the urea solution tank, it may occur the following problems.
  - Increased emission
  - Malfunction with the DPF system
  - Engine failure

Never add the used urea solution, which is drained from the tank (i.e. while maintaining the vehicle). Its purity cannot be guaranteed. Always add the new urea solution.

Liquid such as diesel, gasoline and alcohol shall never be used for SCR system. Any fluid Specification other than recomof the mended urea solution (conform to ISO22241 tandard urea solution or DIN70070) can damage SCR system hardware and deteriorate vehicle emission.

## A WARNING

- When opening the urea solution tank cap at high outside temperatures, ammonia vapors may escape. Ammonia vapors have a pungent smell and primarily cause irritation of the:
  - Skin
  - Mucous membranes
  - Eyes

You may experience a burning sensation in your eyes, nose and throat, as well as coughing and watering of the eyes. Do not inhale ammonia vapors. Do not allow urea solution to come in direct contact with your skin. It is hazardous to your health. Wash any affected areas off with plenty of clean water. If necessary, consult a doctor.

• When handling with urea solution in closed space, ensure good ventilation. When the bottle of urea solution container is opened, pungent smelling fumes may escape.

(Continued)

### (Continued)

- Keep urea solution out of reach of children.
- When urea solution overflows into vehicle surface, wash out vehicle surface with clean water to prohibit corrosion from occurring.
- When replenishing, be careful lest the urea solution should overflow.
- In case the vehicle was parked at very low ambient temperature (below 11 dgree Celcius) for a long time, the urea solution will be frozen in the urea solution tank. With frozen urea, the tank level may not be detected correctly until the urea solution will be defrosted by activated heater. Incorrect urea or diluted urea can increase the freezing point, and thus defrosting may not be properly done by the heater which is activated below certain temperatures. This phenomenon may cause malfunction of the SCR system which can lead to the prohibition of engine restarting. (Continued)

(Continued)

• The time to defrost the urea solution varies in accordance with driving conditions and outside temperatures.

## ! CAUTION

 If defective urea solution or liquid that is not recommended is supplied, there may be damage on the parts of the vehicle such as processing device. If defective fuel is used, foreign objects will be accumulated to SCR catalyst and cause catalyst pushed away or breaking.

After adding the incorrect urea solution, please visit the closest service center as early as possible.

- Liquid that are not recommended such as diesel, gasoline, and alcohol shall never be used other than the recommended urea solution that satisfy ISO22241 or DIN70070.
- If defective urea solution or liquid that is not recommended is supplied, there may be damage on the parts of the vehicle such as processing device. If defective fuel is used, foreign objects will be accumulated to SCR catalyst and cause catalyst pushed away or breaking.

Dimensions / 8-2 Engine / 8-2 Bulb wattage / 8-3 Tires and wheels / 8-4 Tire load and speed capacity / 8-5 Air conditioning system / 8-5 Weight and volume / 8-6 **Recommended lubricants and capacities / 8-7** Vehicle identification number (VIN) / 8-10 Vehicle certification label / 8-10 Tire specification and pressure label / 8-11 Engine number / 8-11 Air conditioner compressor label / 8-12 **Declaration of conformity / 8-12** Fuel label / 8-13

## Specifications & Consumer information 8

## DIMENSIONS

### Wagon

Item	mm (in)				
Overall length	47	75 (187.9)			
Overall width	18	315 (71.4)			
Overall height	14	170 (57.8)			
	205/60R16	1591 (62.6)			
Front tread	215/50R17	1579 (62.1)			
	225/45R18	1579 (02.1)			
	205/60R16	1597 (62.8)			
Rear tread	215/50R17	1585 (62.4)			
	225/45R18	1505 (02.4)			
Wheelbase	27	70 (109.0)			

### Sedan

mm (in)			
47	45 (186.8)		
18	315 (71.4)		
14	70 (57.8)		
205/60R16	1591 (62.6)		
215/50R17	1579 (62.1)		
225/45R18	1579 (02.1)		
205/60R16	1597 (62.8)		
215/50R17	1585 (62.4)		
225/45R18	1505 (02.4)		
2770 (109.0)			
	47 18 205/60R16 215/50R17 225/45R18 205/60R16 215/50R17 225/45R18		

## ENGINE

ltem		Gasoline (1.6 GDI)	Diesel (smartstream D1.6)	Diesel (1.7 VGT)	
Displacement	cc (cu. in)	1591 (97.08)	1598 (97.52)	1685 (102.8)	
Bore x Stroke	mm (in.)	77x85.44 (3.03x3.36)	77.0 x 85.8 (3.03x3.38)	77.2x90 (3.04x3.54)	
Firing order		1-3-4-2	1-3-4-2	1-3-4-2	
No. of cylinders		4, In-line	4, In-line	4, In-line	

## **BULB WATTAGE**

	Light	Bulb	Bulb type	Wattage
	Headlights	Low (Halogen type)	H7S	55
	Headlights	High (Halolgen type)	HB3	60
		Low/High (HID, AFS type)	D3S	35
	Low beam assist - sta	atic	H7	55
Front	Daytime running light	t (DRL)	LED	LED
	Front turn signal light	S	PY21W	21
	Position lights		LED	LED
	Side repeater lights		LED	LED
	Front fog lights		LED	LED
	Rear fog light		H21W	21
	Stop and tail lights (C	Outside)	LED	LED
	Rear turn signal lights (Outside)		PY21W	21
Rear	Tail light (Inside)		LED	LED
	Back-up lights (Inside	2)	W16W	16
	High mounted stop lig	ght	LED	LED
	License plate lights		W5W	5
	Map lamps		FESTON	8
	Deem lampa	Туре А	FESTON	10
Interior	Room lamps	Туре В	LED	LED
menor	Luggage lamp		FESTON	5
	Glove box lamp		FESTON	5
	Vanity mirror lamps		FESTON	5

## TIRES AND WHEELS

			Inf	lation pressu			
Item	Item Tire size		Normal load		Maximum load		Wheel lug nut torque kgf-m (lbf-ft, N-m)
			Front	Rear	Front	Rear	
Full size tire	205/60R16	7.0J×16	2.4 (35, 240)	2.4 (35, 240)	2.4 (35, 240)	2.4 (35, 240)	
Full Size life	215/50R17	7.5Jx17	2.4	2.4	2.4	2.4	11~13
	225/45R18	8.0Jx18	(35, 240)	(35, 240)	(35, 240)	(35, 240)	(79~84, 107~126)
Compact spare tire	T135/80D17	4.0Tx17	4.2 (60, 420)	4.2 (60, 420)	4.2 (60, 420)	4.2 (60, 420)	

## **\* NOTICE**

• It is permissible to add 3 psi to the standard tire pressure specification if colder temperatures are expected soon. Tires typically loose 1 psi (7 kPa) for every 7°C temperature drop. If extreme temperature variations are expected, recheck your tire pressure as necessary to keep them properly inflated.

• An air pressure generally decreases, as you drive up to a high-altitude area above sea level. Thus, if you plan to drive a high-altitude area, check the tire pressures in advance. If necessary, inflate them to a proper level. (Air inflation per altitude : +10 kPa/1 km)

## TIRE LOAD AND SPEED CAPACITY

ltem	Tire size	Wheel size	Load Capacity		Speed Capacity	
nem	The size		LI *1	kg	SS *2	km/h
	205/60R16	7.0J X 16	92	630	V	240
Full size tire	215/50R17	7.5J X 17	95	690	V	240
	225/45R18	8.0J X 18	95	690	V	240
Compact spare tire	T135/80D17	4.0T X 17	103	875	М	130

\*1 LI : LOAD INDEX

\*2 SS : SPEED SYMBOL

### AIR CONDITIONING SYSTEM

Items		Weight of Volume	Classification
Refrigerant	General	550 ± 25g	R-134a
rtoingolaite	Europe	$(19.4 \pm 0.8)$	K-134a
g (oz.)	Europe	500 ± 25g (17.6 ± 0.8)	R-1234yf
Compressor lubricant	g (oz.)	$120 \pm 10g$ (4.2 ± 0.3)	PAG (PAG 30)

We recommend that you contact an authorized HYUNDAI dealer for more details.

## WEIGHT AND VOLUME

#### Wagon

Iten	•		Gasoline Engine	Diese	I Engine
lien	1		1.6 GDI	1.7 VGT	Smartstream D1.6
Gross vehicle weight		M/T	2030 (4475)	-	2130 (4696)
	kg (lbs.)	DCT	-	2150 (4739)	2150 (4739)
Luggage volume		Min.	553 (19.5)		
	l (cu ft)	Max.	1719 (60.7)		

M/T : Manual transaxle

DCT : Dual clutch transmission

Min. : Behind rear seat to upper edge of the seat back.

Max. : Behind front seat to roof.

### Sedan

lten	2		Gasoline Engine	Diesel	Engine
liten	1		1.6 GDI	1.7 VGT	Smartstream D1.6
Gross vehicle weight		M/T	1980 (4365)	-	2090 (4608)
	kg (lbs.)	DCT	-	2100 (4630)	2100 (4630)
Luggage volume	l (cu ft)			525 (18.5) *1/505 (17.8) *2	

\*1 : With TireMobilityKit

\*2 : With spare tire

M/T : Manual transaxle

DCT : Dual clutch transmission

86

## **RECOMMENDED LUBRICANTS AND CAPACITIES**

To help achieve proper engine and powertrain performance and durability, use only lubricants of the proper quality. The correct lubricants also help promote engine efficiency that results in improved fuel economy.

These lubricants and fluids are recommended for use in your vehicle.

	Lubrican	t		Volume	Classification
Engine oil *1 *2 (drain and refill)	Gasoline	1.6	with GPF *3	3.6 <i>l</i> (3.80 US qt.)	ACEA C2 or C3
(,	Engine	GDI	without GPF *3	3.6 <i>l</i> (3.80 US qt.)	ACEA C2 or C3 or ACEA A5/B5
Recommends		Sma	rtstream D1.6	4.4 <i>l</i> (4.60 US qt.)	ACEA C5 or C2 or C3
HELIX	Diesel Engine	1.7 VGT	with DPF *4	5.3 <i>l</i> (5.60 US qt.)	ACEA C2 or C3
		1.7 VGT	without DPF *4	5.3 <i>l</i> (5.60 US qt.)	ACEA C2 or C3 or ACEA A3/B4
	Gasoline Engine		1.6 GDI	1.6 <i>l</i> ~ 1.7 <i>l</i> (1.70 ~ 1.80 US qt.)	HK MTF 70W (SK)
Manual transaxle fluid	Diesel Engine	Smartstream D1.6		High : 1.8 <i>l</i> ~1.9 <i>l</i> (1.58 ~ 1.67 US qt.) Low : 1.5 <i>l</i> ~1.6 <i>l</i> (1.32 ~ 1.41 US qt.)	SPIRAX S6 GHME 70W (H.K.SHELL) GS MTF HD 70W (GS CALTEX) API GL-4, SAE 70W
Dual clutch	Diesel	Sma	rtstream D1.6	1.9 <i>l</i> ~ 2.0 <i>l</i>	HK MTF 70W (SK) SPIRAX S6 GHME 70W (H.K.SHELL)
transmission fluid	Engine	1.7 VGT		(2.01 ~ 2.11 US qt.)	GS MTF HD 70W (GS CALTEX) API GL-4, SAE 70W

\*1 Refer to the recommended SAE viscosity numbers on 8-9 page.

\*<sup>2</sup> Engine oils labeled Energy Conserving Oil are now available. Along with other additional benefits, they contribute to fuel economy by reducing the amount of fuel necessary to overcome engine friction. Often, these improvements are difficult to measure in everyday driving, but in a year's time, they can offer significant cost and energy savings.

\*3 Gasoline Particulate Filter

\*3 Diesel Particulate Filter

	Lubrican	t	Volume	Classification
Gasoline Engine		1.6 GDI	6.8 <i>l</i> (7.18 US qt.)	Mixture of antifreeze and distilled water
Coolant	Diesel	Smartstream D1.6	7.8 <i>l</i> (8.2 US qt.)	(Ethylene-glycol with phosphate based coolant for cooling device)
E	Engine	1.7 VGT	6.9 <i>l</i> (7.29 US qt.)	
Brake/clutch fluid			0.7 <i>l</i> ~ 0.8 <i>l</i> (0.7 ~ 0.8 US qt.)	FMVSS116 DOT-3 or DOT-4
Fuel			70 <i>l</i> (18.49 US gal.)	Refer to "Fuel requirements" in chapter 1

## Recommended engine oil (For Europe)

	Product				
Supplier	Gasoline Engine	Diesel Engine			
	1.6 GDI	Smartstream D1.6	1.7 VGT		
Shell	Helix Ultra A5/B5 0W30	Helix Ultra ECT C2/C3 0W30			
Shell	Helix Ultra ECT C2/C3 0W30	Helix Olita EC	1 02/03 00030		

## Recommended SAE viscosity number

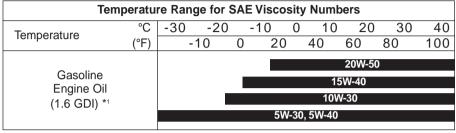
### .! CAUTION

Always be sure to clean the area around any filler plug, drain plug, or dipstick before checking or draining any lubricant. This is especially important in dusty or sandy areas and when the vehicle is used on unpaved roads. Cleaning the plug and dipstick areas will prevent dirt and grit from entering the engine and other mechanisms that could be damaged.

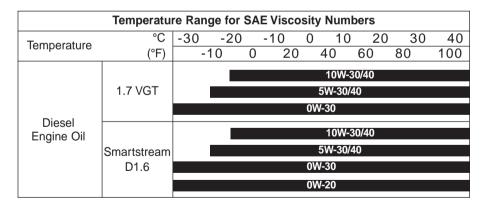
Engine oil viscosity (thickness) has an effect on fuel economy and cold weather operating (engine start and engine oil flowability). Lower viscosity engine oils can provide better fuel economy and cold weather performance, however, higher viscosity engine oils are required for satisfactory lubrication in hot weather.

Using oils of any viscosity other than those recommended could result in engine damage.

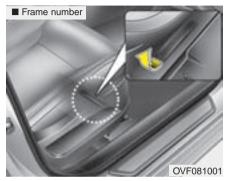
When choosing an oil, consider the range of temperature your vehicle will be operated in before the next oil change. Proceed to select the recommended oil viscosity from the chart.



\*1 For better fuel economy, it is recommended to use the engine oil of a viscosity grade SAE 5W-30 (ACEA A5/B5). However, if the engine oil is not available in your country, select the proper engine oil using the engine oil viscosity chart.

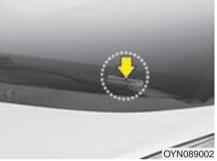


## **VEHICLE IDENTIFICATION NUMBER (VIN)**



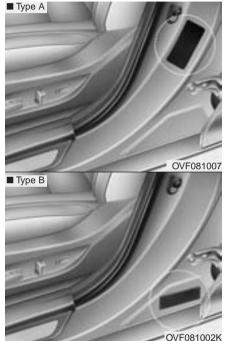
The vehicle identification number (VIN) is the number used in registering your vehicle and in all legal matters pertaining to its ownership, etc.

The number is punched on the floor under the passenger seat. To check the number, open the cover. ■ VIN label (if equipped)



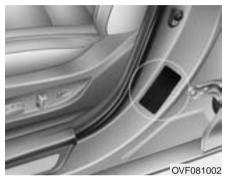
The VIN is also on a plate attached to the top of the dashboard. The number on the plate can easily be seen through the windshield from outside.

## VEHICLE CERTIFICATION LABEL



The vehicle certification label attached on the driver's (or front passenger's) side center pillar gives the vehicle identification number (VIN).

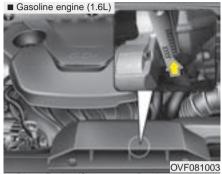
## TIRE SPECIFICATION AND PRESSURE LABEL



The tires supplied on your new vehicle are chosen to provide the best performance for normal driving.

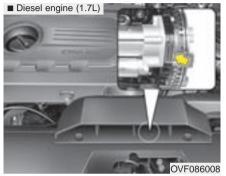
The tire label located on the driver's side center pillar gives the tire pressures recommended for your vehicle.

### **ENGINE NUMBER**



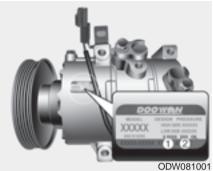
Diesel Engine (Smartstream D1.6)





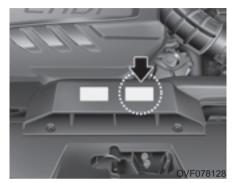
The engine number is stamped on the engine block as shown in the drawing.

### AIR CONDITIONER COMPRESSOR LABEL



A compressor label informs you the type of compressor your vehicle is equipped with such as model, supplier part number, production number, refrigerant (1) and refrigerant oil (2).

## **REFRIGERANT LABEL**



The refrigerant label is located at the front of the engine room.

### DECLARATION OF CONFORMITY (IF EQUIPPED)

Example

# **CE CE** 0678

CE0678

The radio frequency components of the vehicle comply with requirements and other relevant provisions of Directive 1995/5/EC.

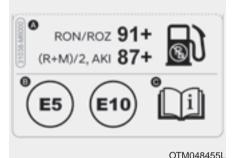
Further information including the manufacturer's declaration of conformity is available on HYUNDAI web site as follows;

http://service.hyundai-motor.com

## FUEL LABEL (IF EQUIPPED)

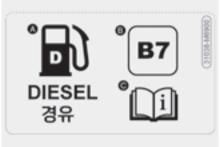
### **Gasoline engine**

The fuel label is attached on the fuel filler door.



### **Diesel engine**

The fuel label is attached on the fuel filler door.



OTM048456L

- A. Octane rating of unleaded gasoline
  - 1) RON/ROZ : Research Octane Number
  - 2) (R+M)/2, AKI : Anti Knock Index
- not use any other fuel.
- C. For further details, refer to "Fuel requirements" in chapter 1.

- A. Fuel : Diesel
- B. Identifiers for FAME containing Dieseltype Fuels
  - \* This symbol means usable fuel. Do not use any other fuel.
- C. For further details, refer to "Fuel requirements" in chapter 1.