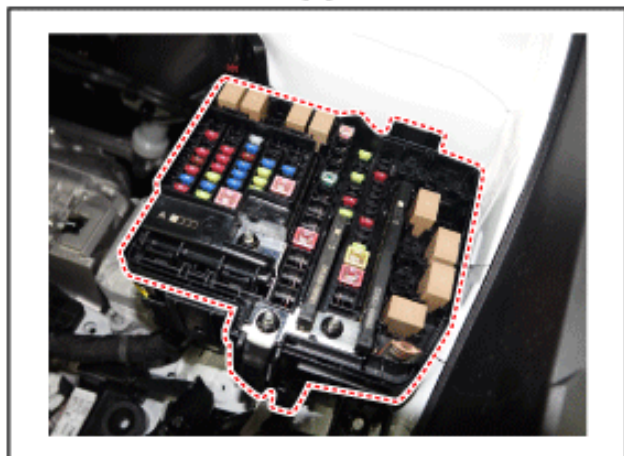
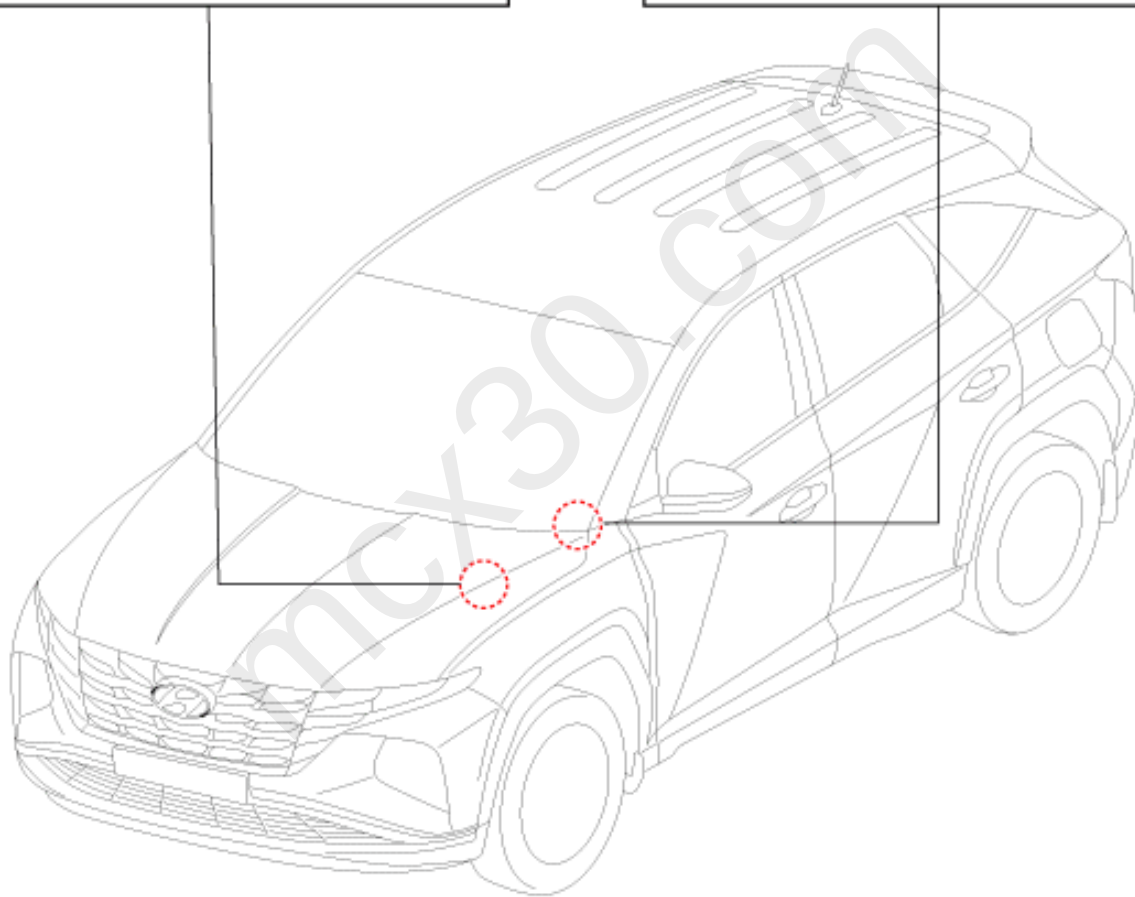
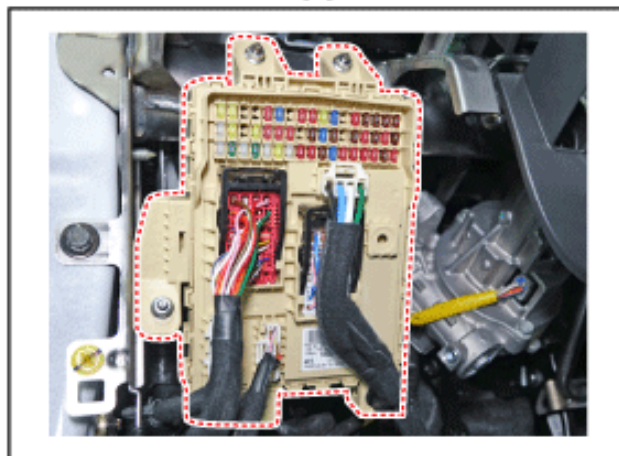


[1]



[2]



1. Engine room junction block

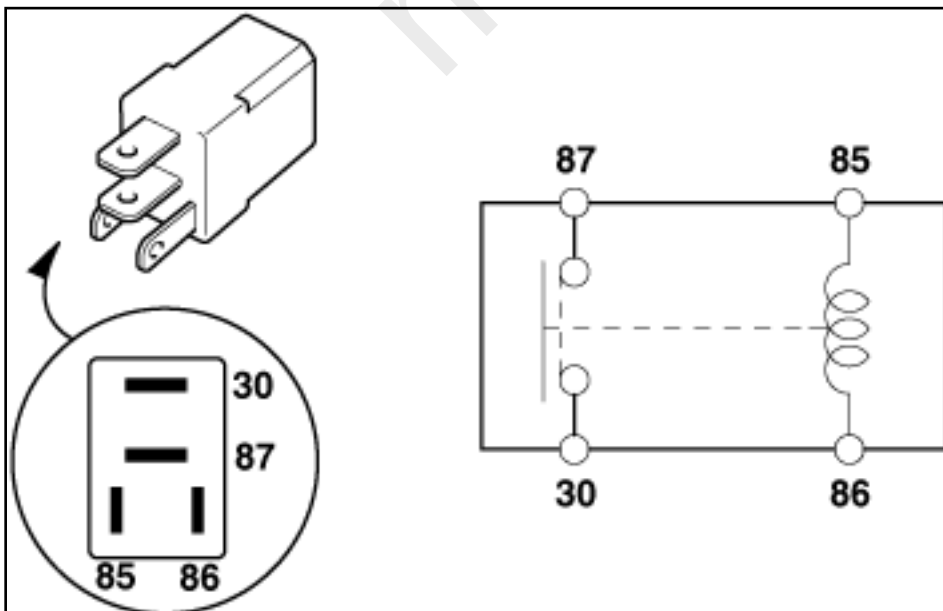
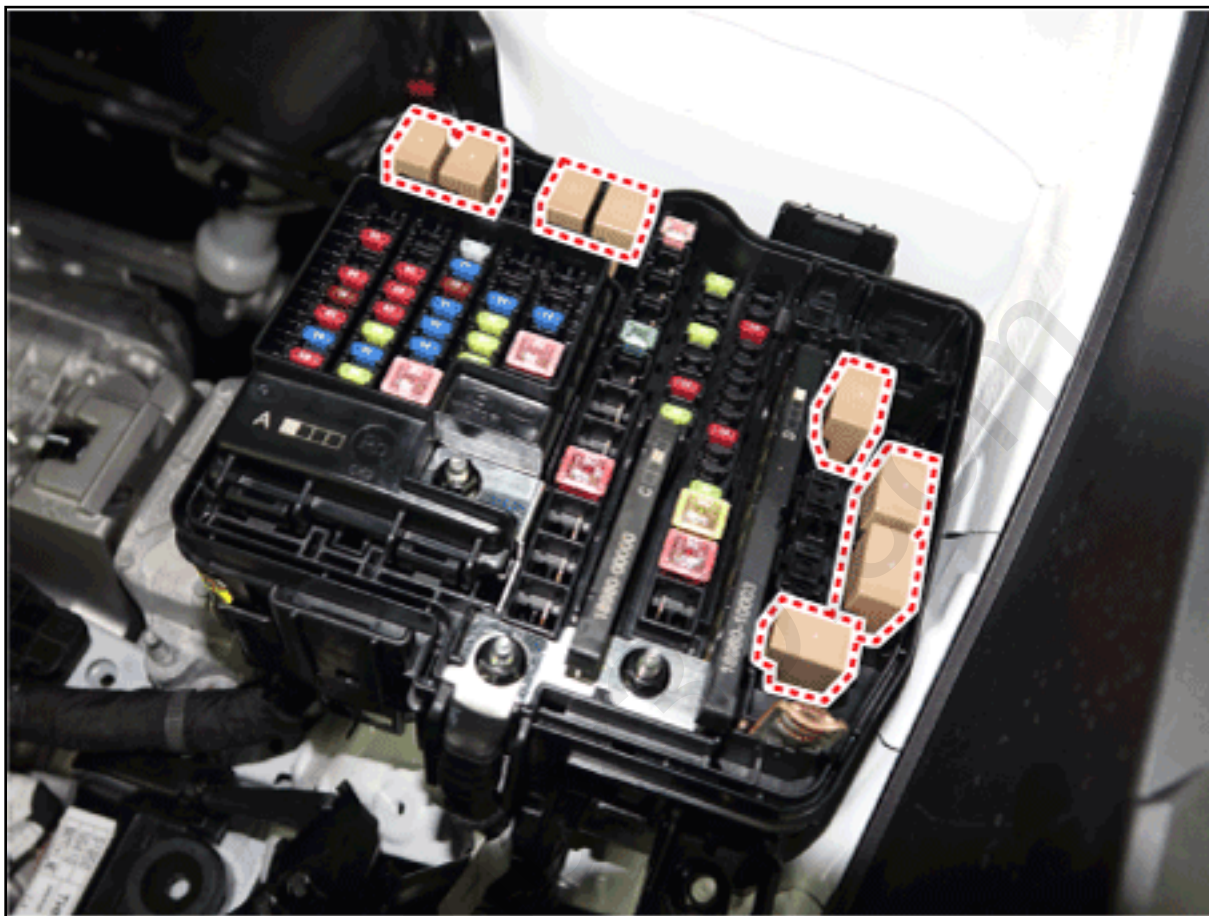
2. ICU Junction block

Inspection

Power Relay (Type A)

1. There should be continuity between the No.30 and No.87 terminals when power and ground are connected to the No.85 and No.86 terminals.
2. There should be no continuity between the No.30 and No.87 terminals when power is disconnected.

[Engine room relay box]





Replacement of PCB Block

1. Disconnect the negative (-) battery terminal.
2. Push 4 hooks in the engine room relay box out to the arrow direction and put up the PCB block (A).



3. Disconnect the connector and remove the the PCB block (A).

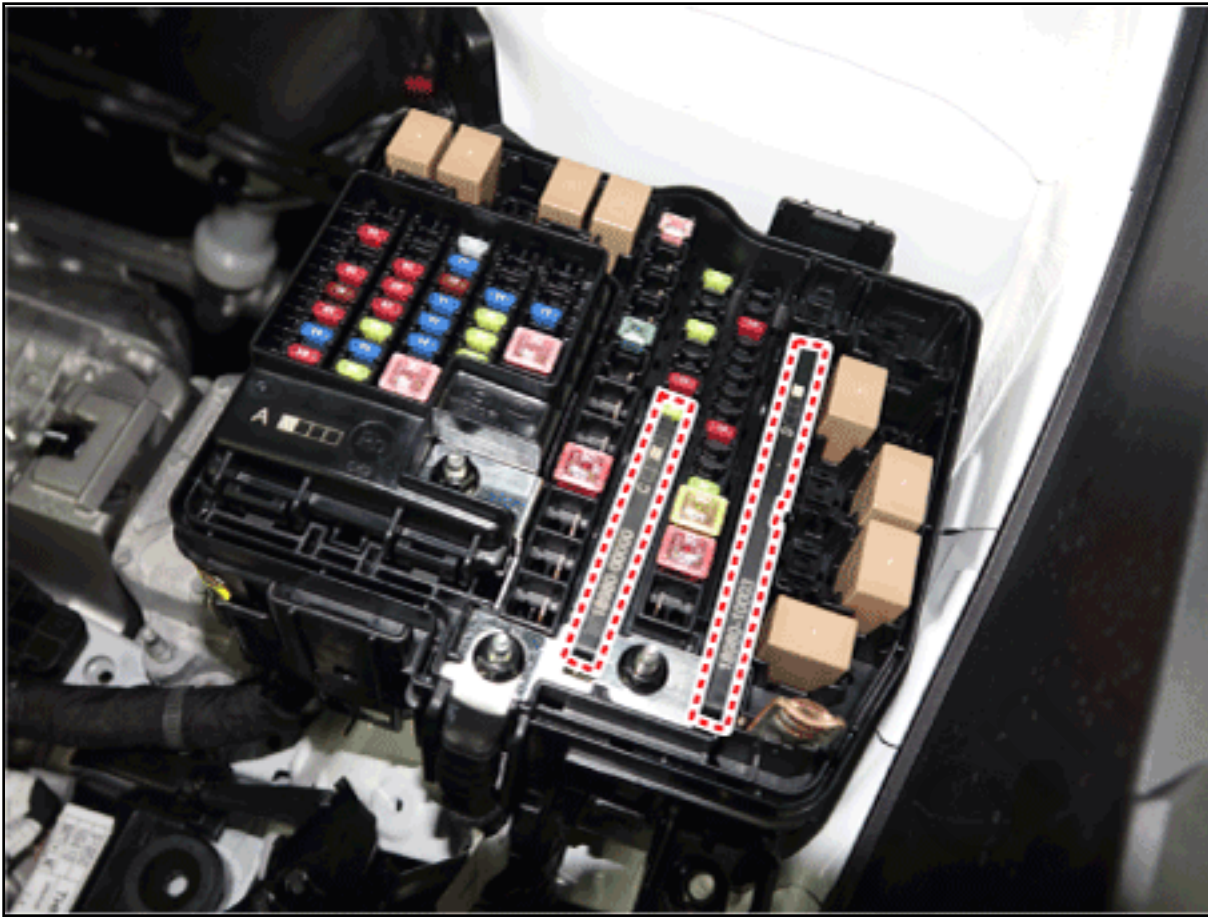
Fuse

1. Be sure there is no play in the fuse holders, and that the fuses are held securely.
2. Are the fuse capacities for each circuit correct?
3. Are there any blown fuses?



- If a fuse is to be replaced, be sure to use a new fuse of the same capacity. Always determine why the fuse blew first and completely eliminate the problem before installing a new fuse.

Multi Fuse

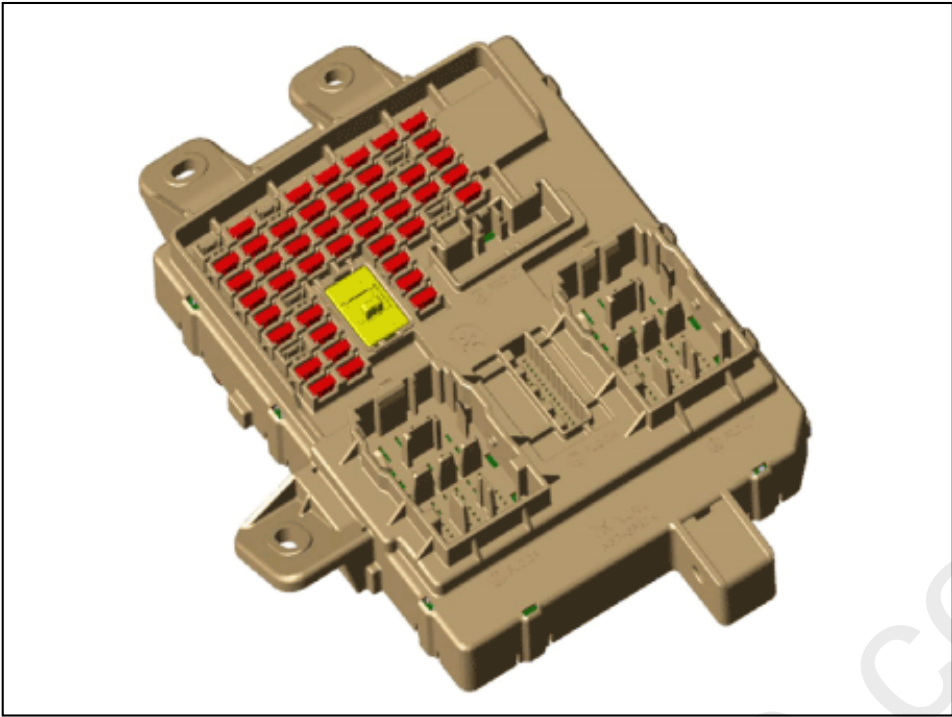


- Multi fuse (A) is needed to replace in the mass when it damaged only one fuse.
- Use the multi fuse capacities for each circuit correctly.

Description and Operation

ICU (Integrated Central Control Unit)

ICU (Integrated Central Control Unit) is an integrated model of smart junction block and central gateway. It performs the function of conventional "Smart junction block" and the function of communication medium of "Central Gateway".



Battery Monitoring System

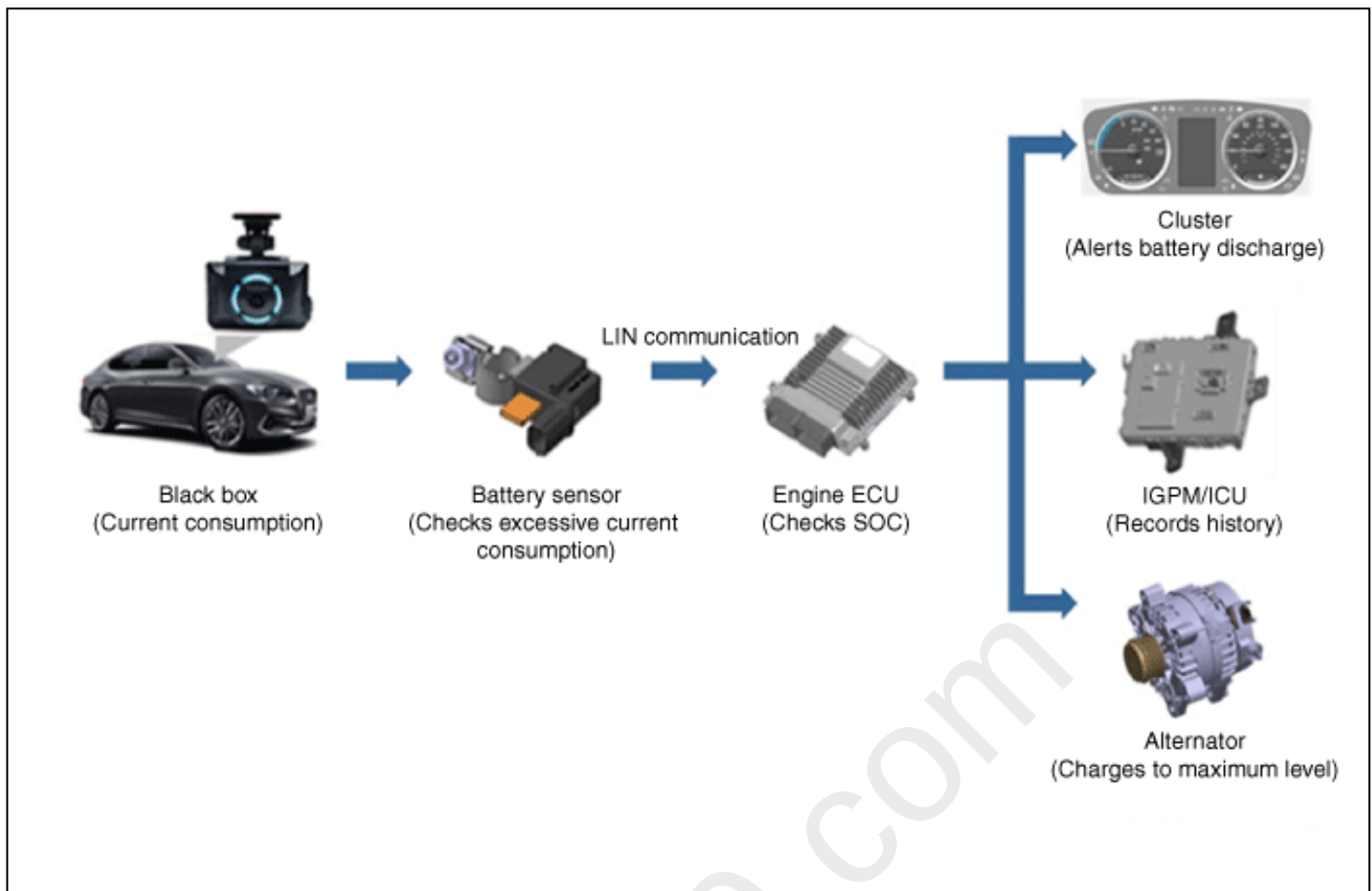
When the risk of battery discharge is detected due to excessive current consumption from using electrical device such as black box while the engine is OFF.

The system warns the customer of battery discharge through the warning message on the cluster.

The battery sensor detects the excessive current consumption of the battery and the Integrated Central control Unit (ICU) records the battery discharge history.

When the battery discharge is detected, the message warning the customer is displayed on the cluster and the battery is charged using the alternator when the engine is driven.

The recorded history can be checked via optional diagnostic tool function: "Check the battery discharge warning history".



Checking the battery discharge warning history

- This function allows checking the history of excessive battery consumption of the parked vehicle.
- It is possible to check the running distance and SOC when the battery consumption was excessive and the current SOC information.

Using diagnostic tool, the "Check the battery discharge warning history" function of ICU is implemented.

1. Procedure for coding variants

- (1) You should read the specification information for the front view camera that is installed in the vehicle before replacing it with a new front view camera.
- (2) Connect the cable of diagnostic tool to the data link connector in driver side crash pad lower panel, and turn on the diagnostic tool.
- (3) Select the 'S/W Management' and 'Car model'.

GDS Update

TSB

MORE ►



Fault Code Searching



ECU Upgrade



DTC Analysis



Data Analysis



Actuation Test



Flight Record



S/W Management



Multi Data Analysis



Recorded Data



Digital Before Service



Measurement



OBD- II



NEW THINKING.
NEW POSSIBILITIES.

(4) Select the "Integrated Central Control Unit" and "Battery Discharge Warning History Check".



■ Audio Video Navigation	
■ Cluster Module	
■ Driver Door Module	
■ Head Up Display	
■ IBU-BCM	
■ IBU-IMMO	
■ IBU-SMK	
■ IBU-TPMS	
■ Power Seat Module	
■ Wireless Power Charger	
■ Integrated Central Control Unit	
■ System Identification	
■ User Option	
■ Battery Discharge Warning History Check	
■ Power Tailgate	
■ e-Call	



Do not touch any system buttons while performing this function.

Fuse
Inspection

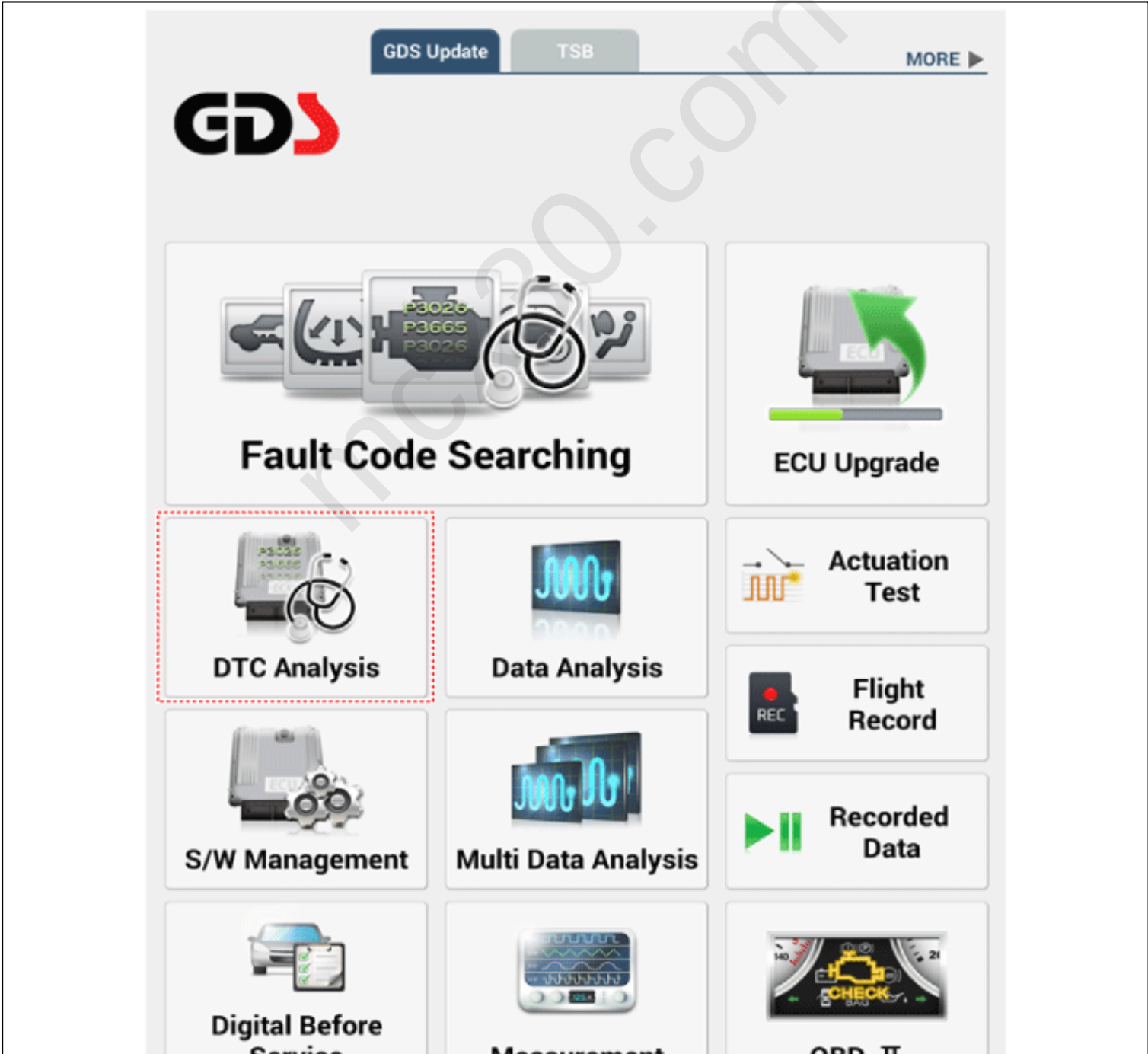
1. Check that the fuse holders are loosely held and that the fuses are securely fixed by the holders.
2. Check that each fuse circuit has the exact fuse capacity.
3. Check the fuses for any damage.

☐

• If a fuse is to be replaced, be sure to use a new fuse of the same capacity. Always identify the cause of the blown fuse and completely eliminate the problem before installing a new fuse.

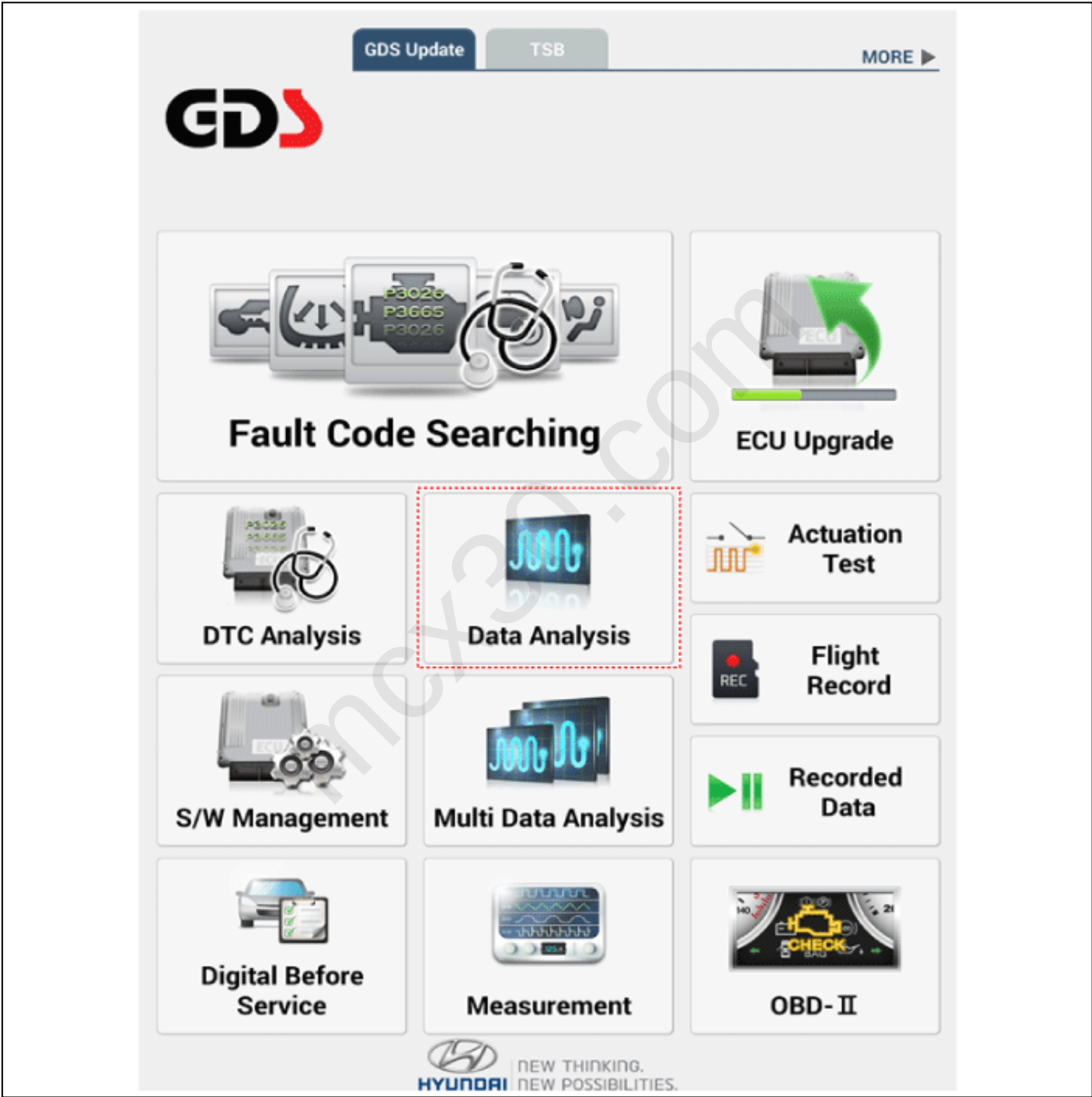
Diagnosis with Diagnostic Tool

1. In the body electrical system, failure can be quickly diagnosed by using the vehicle diagnostic system (diagnostic tool). The diagnostic system(diagnostic tool) provides the following information.
 - (1) The diagnostic system(diagnostic tool) provides the following information.
 - (2) Data Analysis : Checking the system input/output data state
 - (3) Actuation test : Checking the system operation condition
 - (4) S/W Management : Controlling other features including system option setting and zero point adjustment
2. If diagnose the vehicle by diagnostic tool, select "DTC Analysis" and "Vehicle".





3. If check current status, select the "Data Analysis" and "Car model".



4. Select the 'ICU' to search the current state of the input/output data.

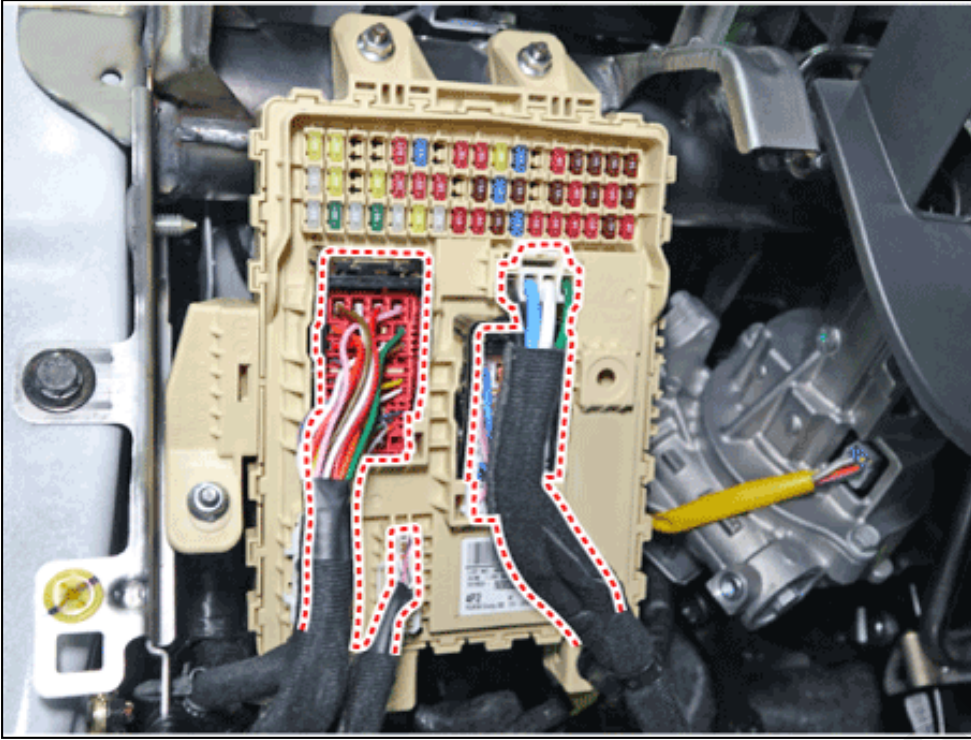


Data Analysis			
Sensor Name(102)	Value	Unit	Link Up
One Touch Turn Signal	3 Flashing	-	
Trunk Option State	OFF	-	
Auto Door Lock	15Km/h	-	
Auto Door Unlock	Key Out(All Doors)	-	
Quiescent Current Control	Customer Mode	-	
Rear LH Door Open Switch	OPEN	-	
Rear LH Door Actuator Position Switch	UNLOCK	-	
Rear RH Door Open Switch	CLOSE	-	
Rear RH Door Actuator Position Switch	UNLOCK	-	
Assist Door Open Switch	CLOSE	-	
Driver Door Open Switch	OPEN	-	
Parking Brake Switch	Not Park	-	
Tailgate Door Switch	CLOSE	-	
Hood Switch	OPEN	-	
Driver Seat Belt Switch	UNBUCKLED	-	
Assist Seat Belt Switch (Option)	BUCKLED	-	
Brake Fluid Switch	OFF	-	
IGN1 Switch	OFF	-	
IGN2 Switch	OFF	-	
AV Tail Output	OFF	-	

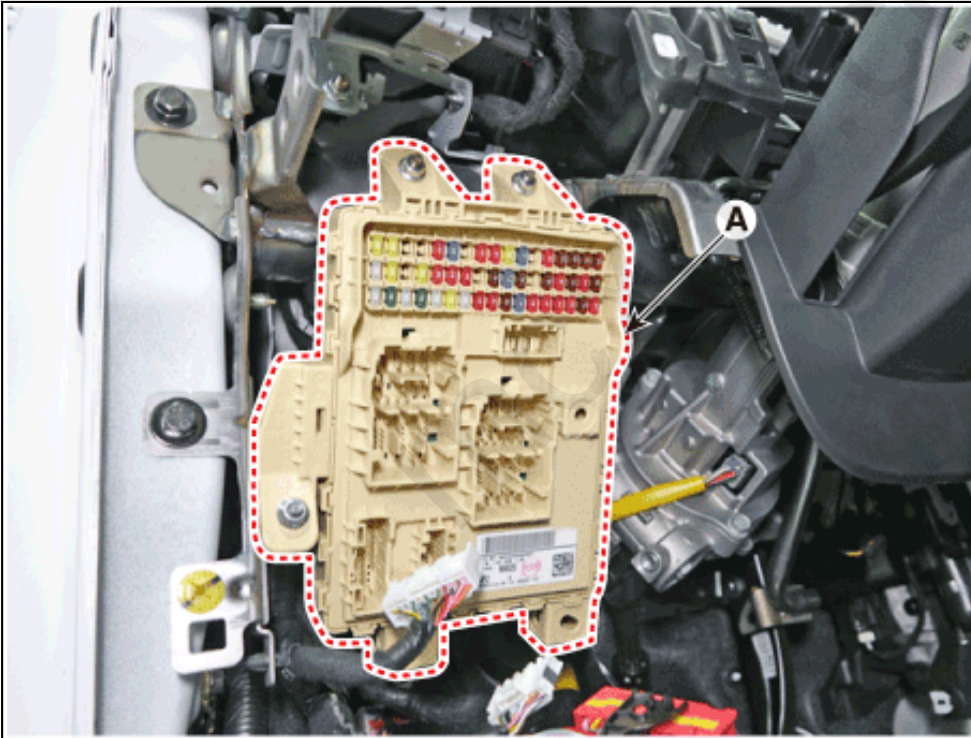
Removal

1. Disconnect the negative (-) battery terminal.
2. Remove the crash pad lower panel.
(Refer to Body - "Crash Pad Lower Panel")

3. Disconnect the connectors from the front side of the ICU.



4. Remove the ICU (A) after loosening mounting nuts.



5. Disconnect the connectors from the back side of the ICU.



Installation

1. Install the ICU.
2. Install the crash pad lower panel.
3. Connect the negative (-) battery terminal.