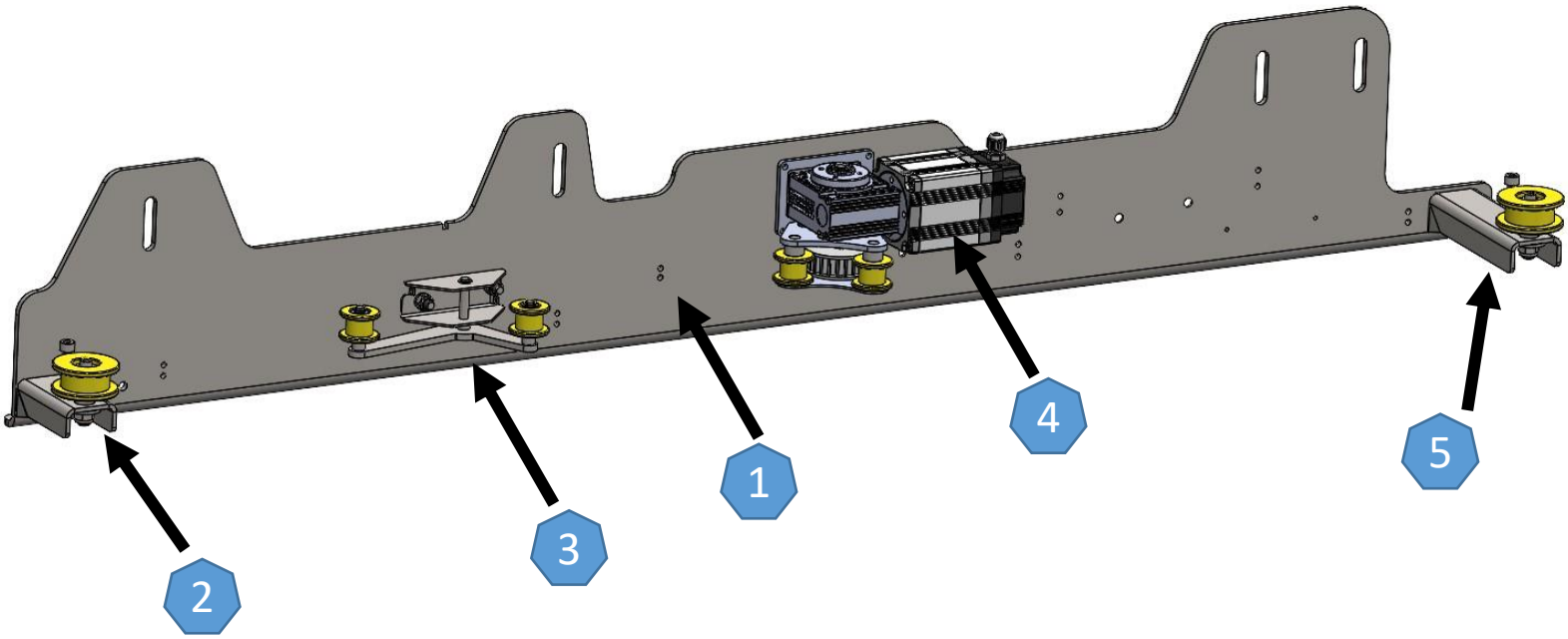
SPRINTER

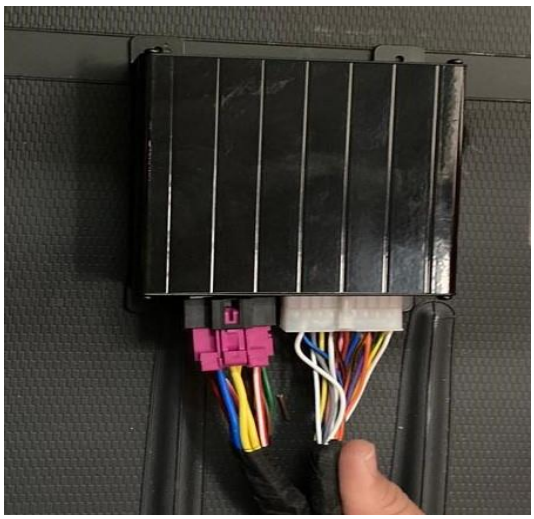
AUTOMATIC SLIDING DOOR AND STEP SYSTEMS

MAIN COMPONENTS OF DOOR SYSTEM



ITEM NO:	DESCRIPTION OF PART
1	CHASSIS OF DOOR SYSTEM
2	REAR ROUTİNG GROUP
3	BELT TENSIONING GROUP
4	MAIN SYSTEM MOTOR (ENGINE) GROUP
5	FRONT ROUTİNG GROUP

MAIN COMPONENTS OF DOOR SYSTEM



Control Unit

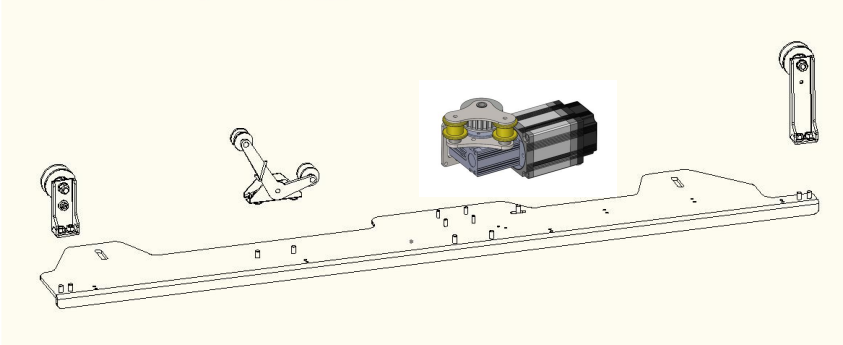
Electrical Wiring: It provides the movement and signal control of automatic door.

RF Transmitter Module: It transmission the door security and door handle signals wirelessly to the control unit.

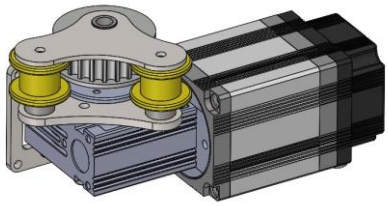
Unlocking System: It is the mechanism that automatically opens the door without changing the original lock mechanism of the vehicle door.

RF Transmitter: Rf transmitter must be in the unlocking mechanism.

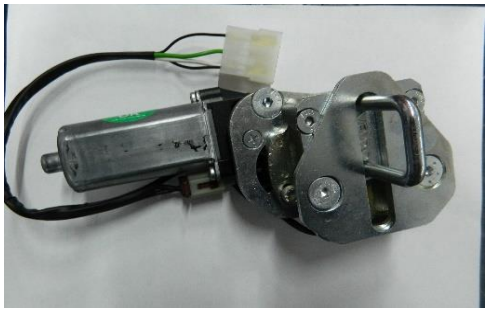
MAIN COMPONENTS OF DOOR SYSTEM



Door Drive Mechanism: It is the part containing the system units and placed under the automatic door on the vehicle chassis.



Motor Group



Lock Puller System: The automatic door ensures that less force is exerted to bring it from the open position to the closed position.

SECURITY SYSTEMS OF VELDO AUTOMATIC DOOR

Security Wick: The automatic door allows the door to open automatically in case of any obstruction or jamming.

Overcurrent control: the safety system that is activated when the safety wick is disabled.

User controlled security system: When the door is automatically closing, the door automatically opens when the user give a command from the front panel button or the door handle.

SECURITY SYSTEMS OF VELDO
AUTOMATIC DOOR

In order to avoid battery discharge failure due to the high standby current of the system;

If you wait for a long time, the system must be put into sleep mode.

Putting the system into Sleep Mode;

The door must be closed, the ignition key must be turned OFF, and the central locks must be locked

SECURITY SYSTEMS OF VELDO AUTOMATIC DOOR

Audible and light warning system: If the automatic door opens from the door handle from inside when the vehicle is moving or standing; the user is audibly warned.

Warning is made by short tones during closing, and by long intermittent tones during opening.

When the door is opened and closed, the control unit gives an audible warning. The user is warned by the light on the front panel button when the door is open.

Speed-controlled safety system: When the vehicle is moving and the speed is above a certain limit (5 km/h) door cannot be open and if the door is open, it automatically closes when a certain speed limit (5km/h) is exceeded. Also, if the sliding door is attempted to open manually from the inside when the vehicle is moving, the system prevents the door from opening.

In case of accident or emergency: In case of emergency, the vehicle door can be opened manually from the inside and outside from the original door handles

WORKING WAYS OF VELDO AUTOMATIC DOOR SYSTEM

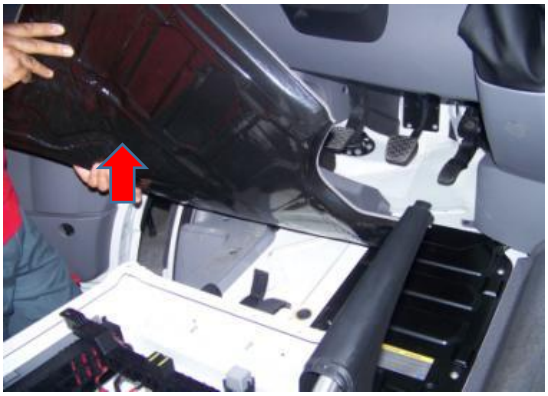
1 - With the open/close button mounted on the front panel of the vehicle.

2 - With the original remote control key of the vehicle.

3- With the original door handle of the vehicle.

ASSEMBLING OF AUTOMATIC DOOR

Driver’s and passenger’s seats are first removed and removed from the car in order to mount Veldo automatic sliding doors.



The front interior mats and ventilation are removed as shown

ASSEMBLING OF AUTOMATIC DOOR

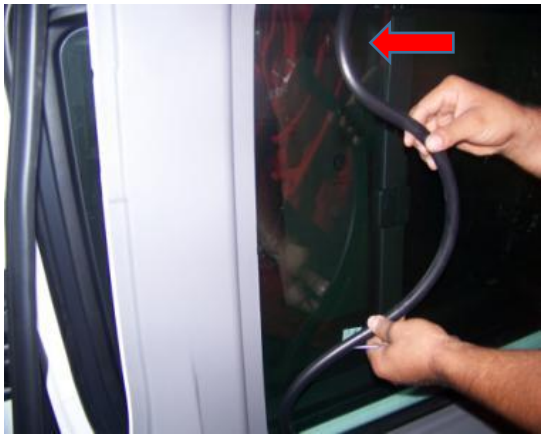
After the cable duct covers are removed, the front part of the vehicle is brought to a lowered position.

B pillar covering is removed after the inner handle on the pillar and the hanging pin are dismantled.

ASSEMBLING OF AUTOMATIC DOOR

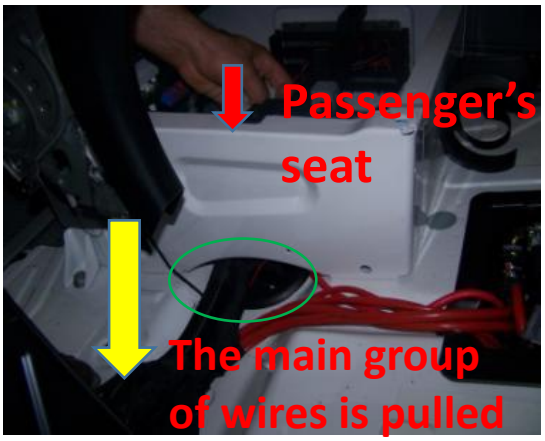
The coating on the inner step and the inner step are removed

Remove the cover of the down part sliding door.



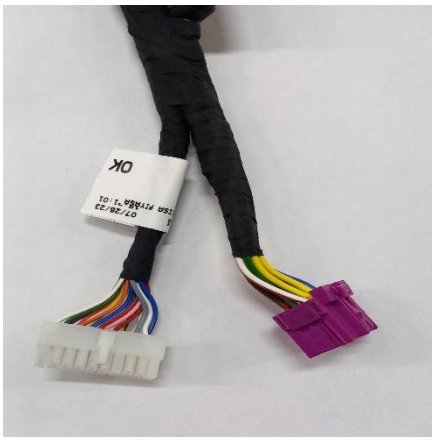
Rear plating, C pillar coating and wick are removed.

ASSEMBLING OF AUTOMATIC DOOR



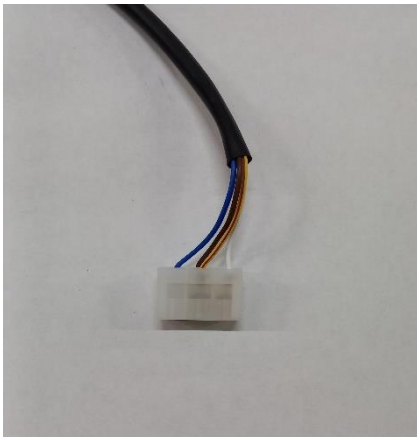
The main system of the Veldo automatic door is pulled from the passenger seat pool into the driver's seat pool.

MAIN SYSTEM INSTALLATION CABLE TIPS



1

2



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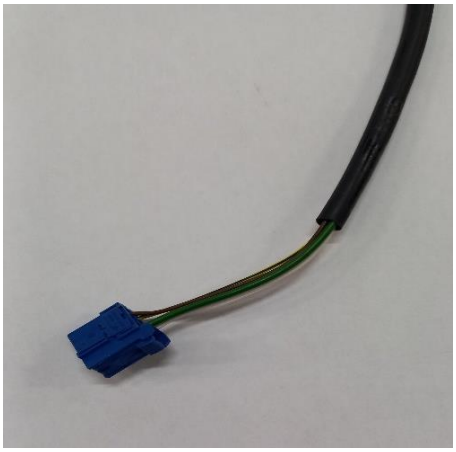

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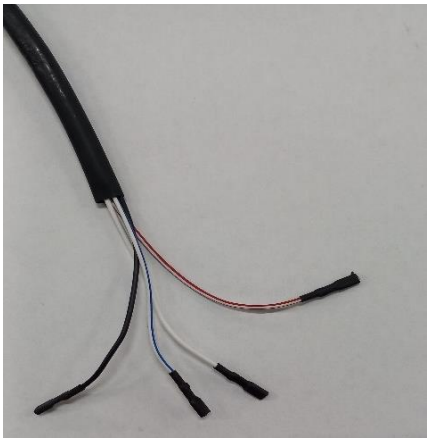

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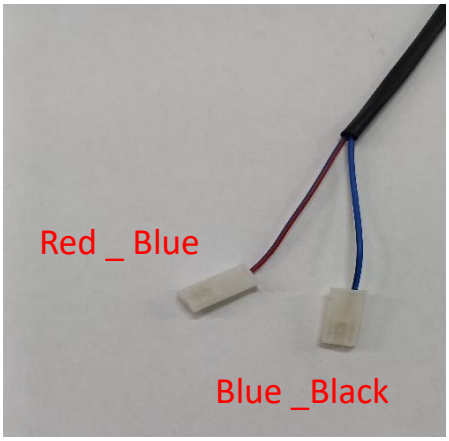

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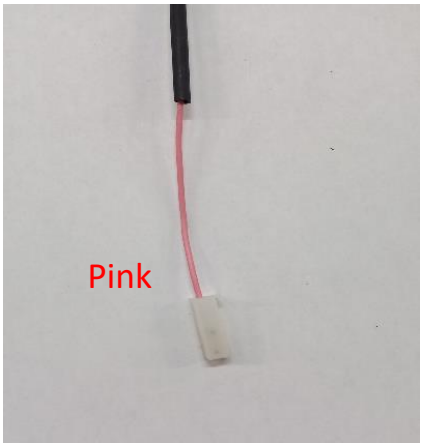

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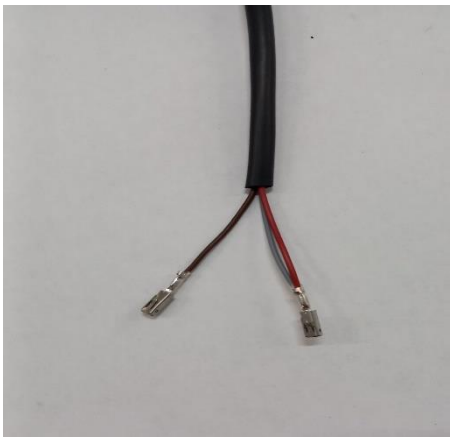
MAIN SYSTEM INSTALLATION CABLE TIPS



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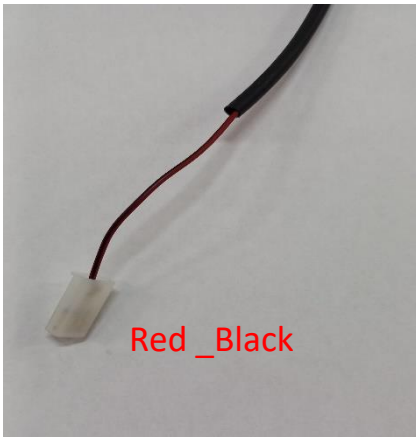


11

1- Control Unit (ECU) Sockets

2-Main System Engine Output Sockets

3-Step Signal Socket:

4-**Optional:** Opkon Socket: Used only in vehicles without a door switch.

5-Lock Puller Socket

6-Power Cables

7-Panel Button Cables

8-Blue-Black (Central Lock Unlocking) and Red-Blue (Central Lock Locking) Cables

9-Speed Information (km/h) Cable

10-B Pillar Switch Cables

11-Ignition Open Information Cable:

The cable for the door open/close button in the main system wiring is routed from behind the center console to the panel slot. Its connectors are then plugged into the button, and finally, the panel is installed.

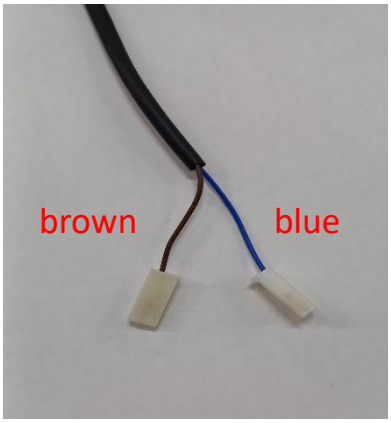
- = white,
+ = red,
COM = white-blue
ON = black

Panel Butonu

DOOR INTERIOR WIRING CABLE ENDS

1

2



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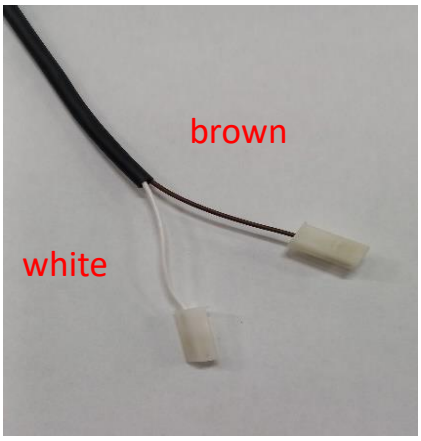

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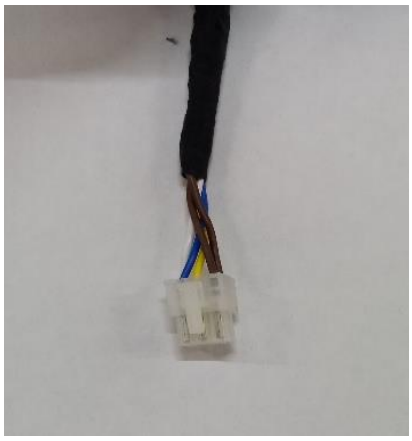


5

1- Indoor Cable Harness

2-Door Switch Cables

3-Spring-loaded Switch (Tractor Switch) Cables

4- Security Wick Cables

5-RF Transmitter Socket

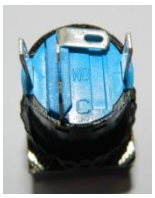
ASSEMBLING OF AUTOMATIC DOOR SYSTEM

As shown in the picture, the automatic sliding door system receive the energy by connecting to the **original battery (+ , -)** of the car, which is located **under the driver's mat** .

A button slot is opened on the front panel in template -1 and the door open/close button is installed.

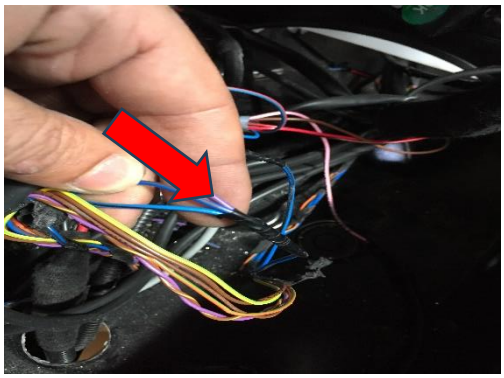
The cable for the door open/close button in the main system wiring is routed from behind the center console to the panel slot. Its connectors are then plugged into the button, and finally, the panel is installed.

\- = white,
\+ = red,
COM = white-blue
ON = black

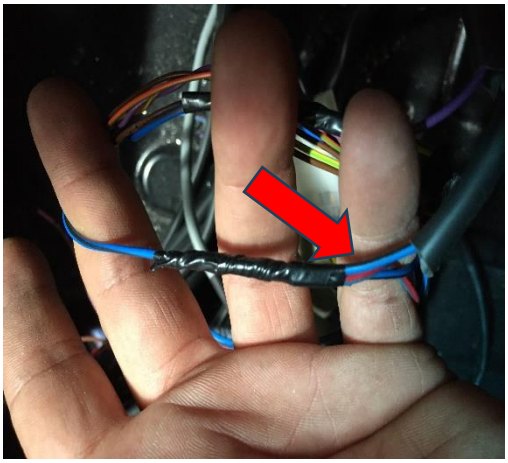


Panel Butonu

ASSEMBLING OF AUTOMATIC DOOR

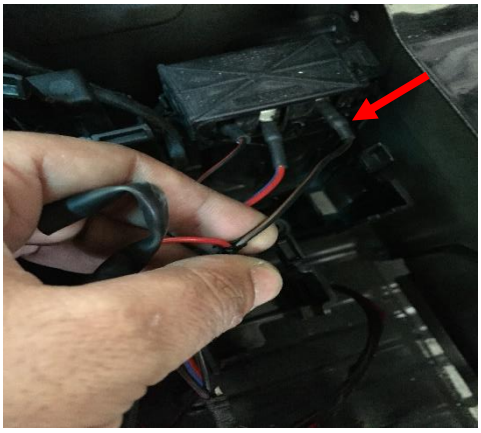


The **blue-black** cable on the main system harness connects to the original vehicle cables beneath the assistant seat, to the **blue-brown** wire that sends the central locking unlock signal.



The **red-blue** cable on the main system harness connects to the vehicle's original cables under the assistant seat, to the **blue-black** wire responsible for the central locking lock signal.

As seen in the diagram, the control unit is installed beneath the assistant seat.

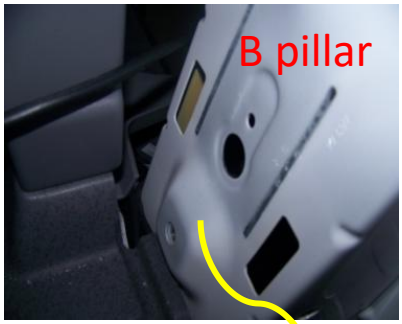


As shown in the diagram, the **brown-black** cable beneath the driver's seat of the vehicle is the ignition switch cable, and it is connected to the **red-black** cable on the main system harness.

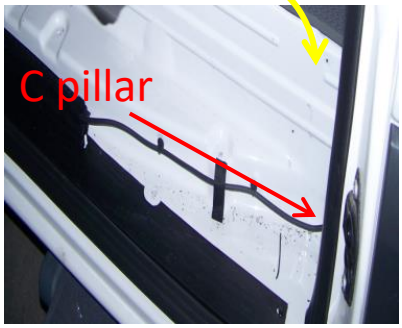
ASSEMBLING OF AUTOMATIC DOOR

A hole is drilled under the passenger seat with the help of template -2, the cable passage rubber is installed

After mounting the Veldo automatic sliding door chassis under the vehicle, the cable of the main system motor kit is extended through the lower part to the hole shown in the diagram and connected to the socket.



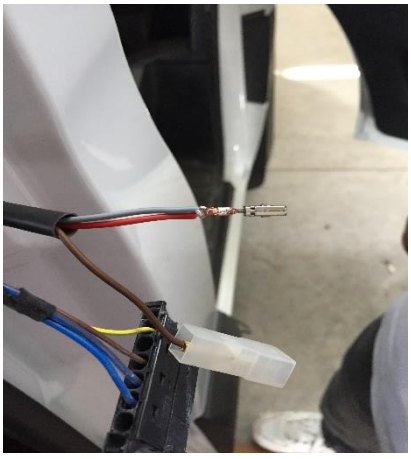
The cable of the lock puller mechanism in the main wiring system is taken from the edge of the B pole coating.

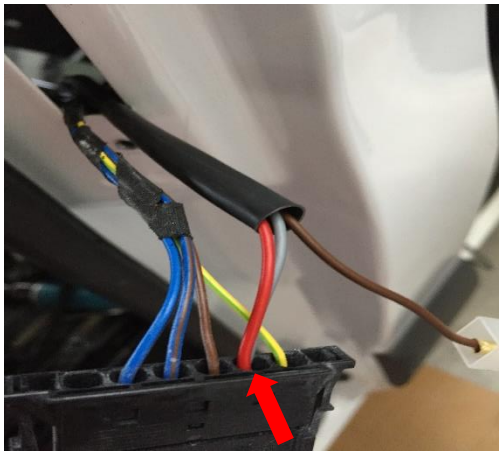


The sliding door is brought up to the C pillar by passing it beneath the dust rubber.

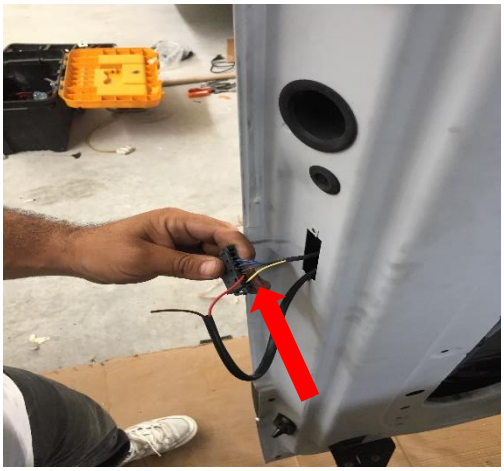
After installing the main system harness, cable channel covers, ventilation, and floor mats are attached.

ASSEMBLING OF AUTOMATIC DOOR





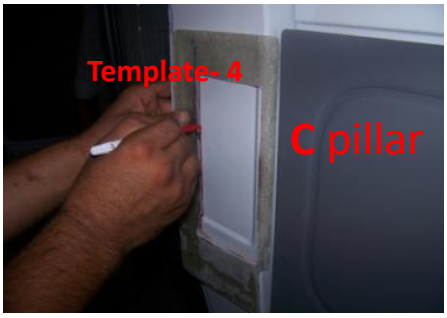
- The **red and grey cables** on the B-pillar of the vehicle are connected and attached to the original switch terminal and installed to the empty place in the original switch socket.
- The **brown** cable extending to the vehicle's B pillar is connected to the **brown cable (GND)** located in the original switch socket.



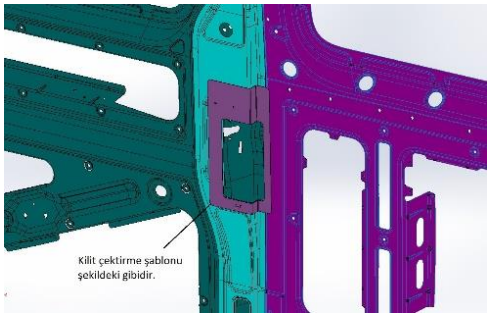
The **red and brown** cables located in the car's in-door installation are connected to the original swich socket located in the door.

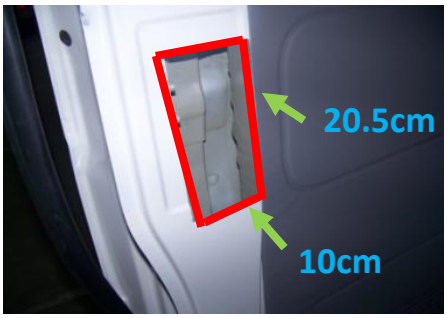
- The **red** cable is attached to the corresponding terminal where we made the connection for **the red and gray** cables on the B pillar switch.
- Brown cable is connected to the corresponding brown cable (which we connected in the B pillar switch).

ASSEMBLING OF AUTOMATIC DOOR

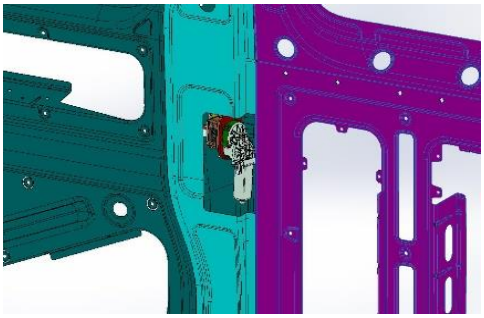


The C pillar is cut with template-4 and the original lock is removed. The cut area is painted with zinc spray.





Red stripes are painted with zinc spray. Its final version is as shown in the picture on the right.

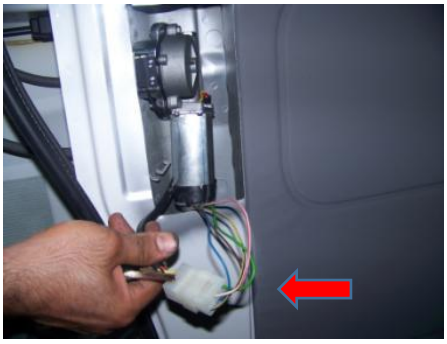


After removing of the lock equivalent of the sliding door, it is cut with the help of template-5.

The cut area is painted with zinc spray

The lock puller mechanism is inserted into place.

ASSEMBLING OF AUTOMATIC DOOR



The sliding door is joined by the cable, extended from under the dust tire.

The sliding door upper lock is dismantled, the wire is removed from its place and the lock is reinstalled.

The top part is grinded

The area opposite the upper lock of the sliding door is removed, the upper bracket part opposite the upper lock is cut from the 0 end as shown in the picture. It fits back in its place

ASSEMBLING OF AUTOMATIC DOOR

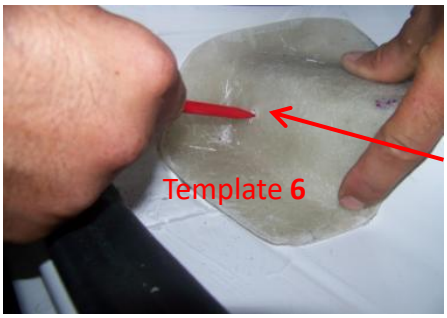
The bottom plastic of the inner step is removed, and the backrest on the side of the cable is cut in order not to interfere with the movement of the belt. After the 60mm belt pass holes are cut, the plastic is attached back

The original sliding door termination bracket is removed.

After the bottom foot hook is completely cut off from the marked place, as shown in the picture, the foot is attached back to the bracket.

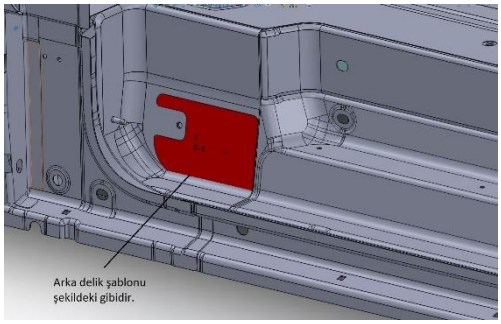
ASSEMBLING OF AUTOMATIC DOOR

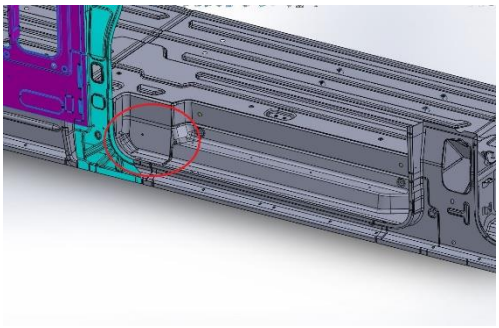
Cut it as it is in the right and reinsert it after cutting the left 60mm strap hole.

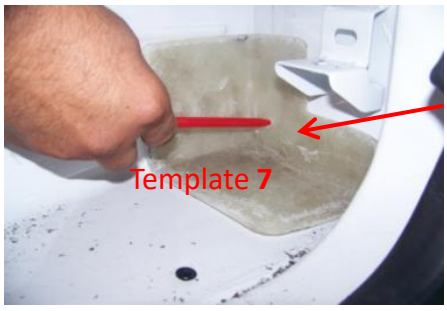


The left foot strap hole is cut with 60 puncher with the aid of template 6.

The cut area is painted with zinc spray.



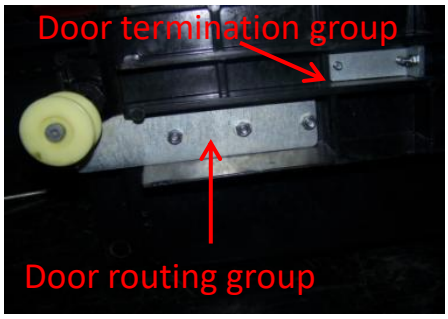




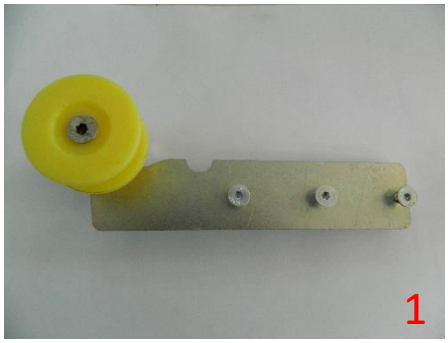
The right foot strap hole is cut with a 60-punch with the aid of template-7.

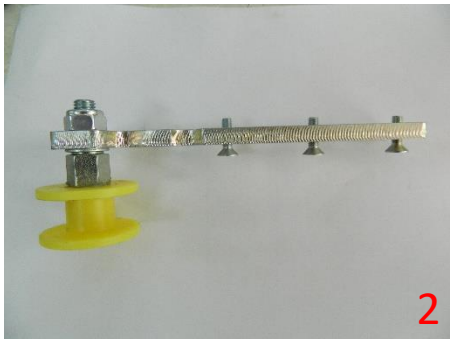
The cut area is painted with zinc spray

ASSEMBLING OF AUTOMATIC DOOR

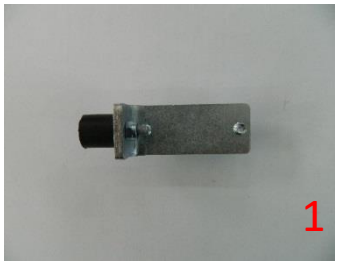


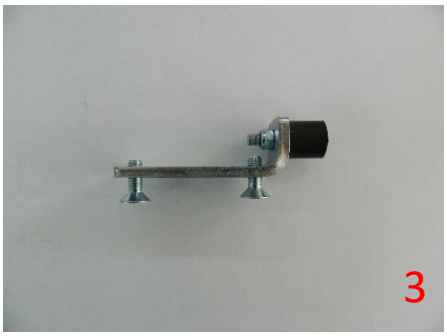
p Door routing group As shown in the left picture, the door termination group and the door routing group are installed under the inner step, and then the inner step is installed in place.





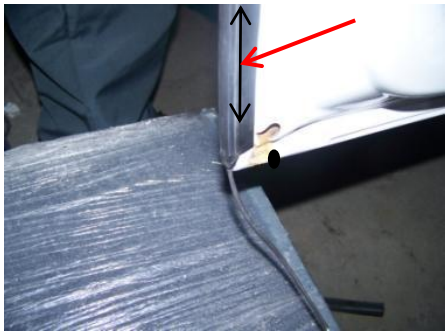
Door Routing Group



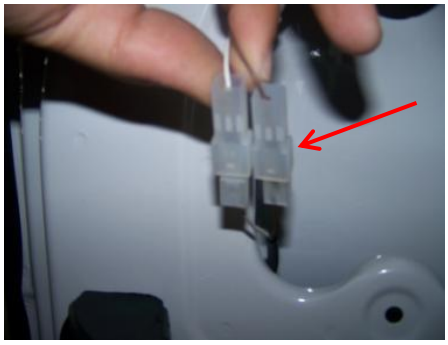


Door Termination Group

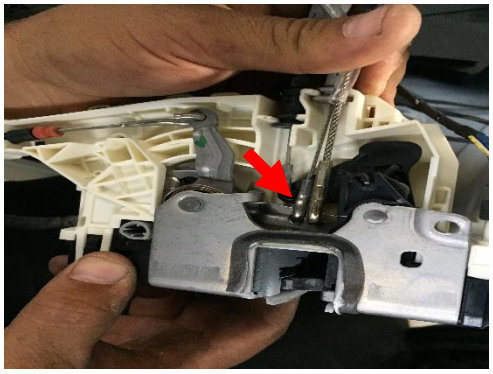
ASSEMBLING OF AUTOMATIC DOOR



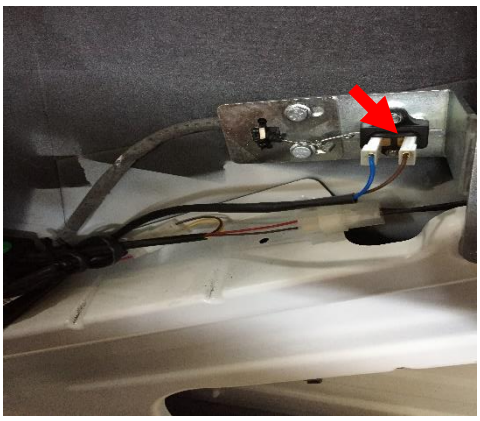
The security wick is attached to the front of the sliding door, the cable is connected by the hole below.



Sockets are installed in the wiring inside of the Veldo door



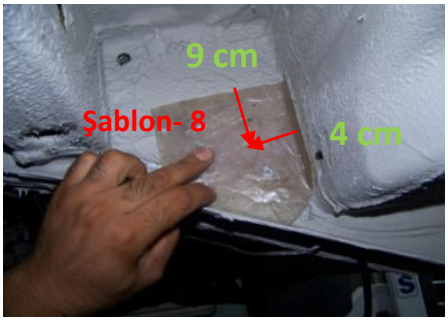
The original sliding door lock is removed, drilled as shown in the picture. The original unlocking wire is attached to the drilled place, the Veldo unlocking wire is attached to the original hole.



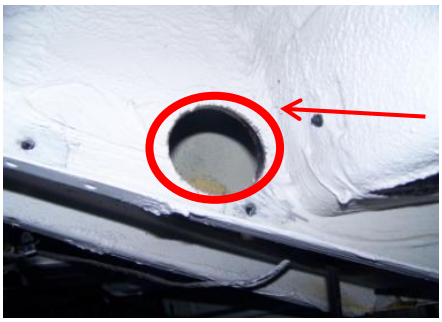
After the unlocking mechanism is installed, the plugs are inserted

ASSEMBLING OF AUTOMATIC DOOR

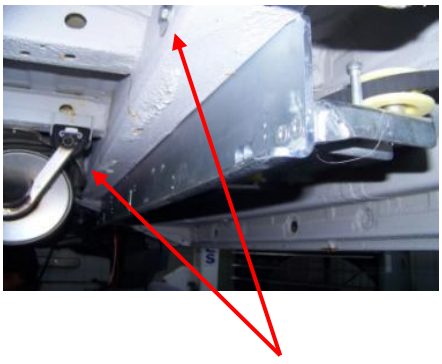
The wire removed from the bottom foot is attached to the switch as shown in the picture. Switch function allows the external door handle to work.



Once the vehicle has been lifted, the chassis is pierced with a 60-inch punch with the aid of the frame template 8 for belt passage of the main system engine group.



The cut area is painted with zinc spray.



The automatic door case is installed in place. The main system engine group is connected to the main wiring system through the wiring transition

The Veldo automatic door chassis is fixed through the vehicle's own original holes.

ASSEMBLING OF AUTOMATIC DOOR

After the system belt is passed through the right-left foot rollers, The reducer flange roller, the belt tension rollers, it is pulled under the inner step.

Note: there should not be belt tensioning when adjusting the belt

The belt bounding is connected to the system belt.

Belt jointing is fixed to the bottom foot

ASSEMBLING OF AUTOMATIC DOOR

Sliding door covering, C pillar covering and wicks are installed on its place.

Veldo automatic door chassis enclosure covers are installed.

OTOMOTİK KAPI SİSTEMİNİN BAKIMI

- Automatic Automatic door and step systems must be maintained once a year.
- System General Checks are done.
- The system belt changes.
- The unlocking pattern changes.

NOTE: Uncared products will be evaluated outside the scope of the Guarantee.

TERMS OF GUARANTEE OF DOOR SYSTEM

The terms of the warranty are part of the purchase agreement between the Veldo authorized dealer and the customer. The customer accepts the warranty terms by signature. Veldo guarantee certificate is given to the customer during delivery of the vehicle. The customer is required to present this document in order to be able to process the warranty. All of the automatic door / step including the parts are guaranteed for 2 years. The start of the guarantee is the delivery date of the Product Assembly or Customer.

DISCLAIMER OF WARRANTY TERMS

- Maintenance and repair of the automatic door / step must be carried out on time, regularly, by the appropriate technical knowledge and competent services and in accordance with the periodic maintenance and repair procedures.
- Failure to follow the instructions in the user manual.
- Automatic door / step; is used under improper conditions or under overload except for the purpose,
- If an original or non-equivalent part is attached to the automatic door / step, or if a change has been made by the manufacturer which is not technically approved,
- If the need for repairs in the purchased item is not reported in time,
- In spite of the warning made by the service, if the vehicle owner or the user has not provided the opportunity to repair it
- Defects due to use at high temperatures from extremely dusty, damp, (+ 80), (- 30) degrees
- Failures caused by natural disasters such as flood, fire, earthquake etc.
- The depreciation and abrasion of the parts which are the result of normal use and the nature of the material is not guaranteed. Examples of these pieces that have been subjected to abrasion include system belt, unlocking tines and rollers. However, parts are guaranteed if the material, workmanship and assembly error, that is, the fabrication error, are detected in these parts. If there are any changes or modifications to the product, the warranty does not apply in case of malfunctions.
- Faults caused by insect or animal damage to the product or damage to the product cables.