



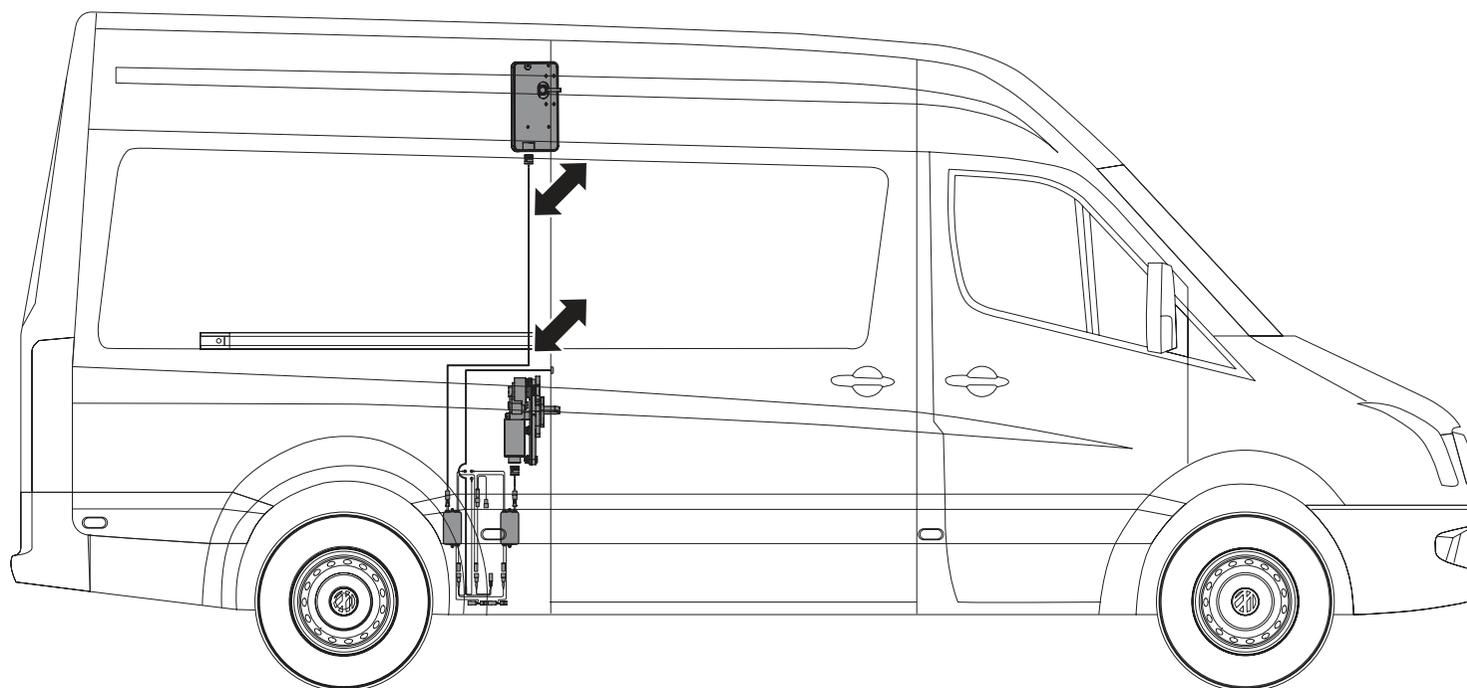
automatic doors

DOOR CLOSERS

02.01.2026

Installation manual

MERCEDES SPRINTER 2006 - present / VW CRAFTER 2006 - 2018



Symbols and means of visualisation

Warnings

Warning notices are used in these instructions to warn you of damage to property and personal injury.

- ▶ Always read and follow these warnings.
- ▶ Follow all measures labelled with the warning symbol and warning word.

Warning symbol	Warning word	Meaning
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WARNING

Hazards for persons.
Non-observance can lead to serious injuries.

Other symbols and visualisation aids

Important information and technical instructions are specially emphasised to clarify correct operation.

Symbol	Meaning
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means 'Important information'.
Information to prevent material damage, to understand or optimise work processes.



means 'additional information'



Symbol for an action: You have to do something here.
▶ Keep to the sequence for several action steps.

Product liability

In accordance with the manufacturer's liability for its products as defined in the Product Liability Act, the information contained in this brochure (product information and intended use, misuse, product performance, product maintenance, information and instruction obligations) must be observed. Failure to do so releases the manufacturer from his liability obligation.

Applicable documents

Type	Name
Operations Manual	Door Closer

The plans are subject to change. Only use the latest version.

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1.1 Intended use

The Croco 102 / 107 rack-and-pinion drive is designed for the automatic opening and closing of sliding doors. The door operator is only suitable for use in panel vans. This door operator fulfils the requirements of UN/ECE R107, 7.6.5.

Any use other than the intended use, e.g. permanent manual operation, and all modifications to the product are not permitted. Observe the 'ADOR product information for drives'.

1.2 Safety instructions

- > Prescribed installation and maintenance work must be carried out by qualified personnel.
- > Assembly requires holes to be drilled in the body parts. The exact position of these drill holes is required in order to maintain the positional accuracy of the assembled components.
- > The country-specific laws and regulations must be observed for safety inspections must be observed.
- > Unauthorised modifications to the drive exclude any liability on the part of ADOR for resulting damage.
- > ADOR accepts no warranty for combinations with third-party products.
- > Only original ADOR parts may be used for repair and maintenance work.
- > In accordance with the Machinery Directive 2006/42/EC, a hazard analysis must be carried out before the door system is a risk analysis must be carried out and the door system labelled in accordance with the CE marking directive 93/68/EEC.
- > Observe the latest directives, standards and country-specific regulations, in particular:
 - > DIN VDE 0100-600: 'Installation of low-voltage systems; Part 6: Tests'
 - > DIN EN 60335-2-103, DIN 18263-4
 - > Accident prevention regulations, in particular BGV A1 'Principles and prevention' and BGV A3 DA 'Implementation instructions for the accident prevention regulation 'Electrical Installations and Equipment'



The product should be installed in such a way that easy access to the product for repairs possible repairs and/or maintenance with relatively little effort and that any and any removal costs are not disproportionate to the economic value of the product. disproportionate to the value of the product.

1.3 Safety-conscious working

- > Secure the workplace against unauthorised access.
- > Only use the cables specified in the cable plan.
- > Secure loose, drive-internal cables with cable ties.
- > Before working on the electrical system: Disconnect the power supply to the starter battery.
- > Always use insulated wire end ferrules for stranded wires.
- > Ensure sufficient lighting.
- > Risk of injury when the sliding door is open. Hair, clothing, cables, etc. can be pulled in by moving parts!
- > Risk of injury due to unsecured crushing, impact, shearing and pull-in points!
- > Risk of injury due to sharp edges on the bodywork!
- > Risk of injury due to freely moving parts during assembly!

1.4 Testing the installed drive

Measures to safeguard against and avoid crushing, impact, shearing and drawing-in points:

- > Check the function of the automatic reversing in the event of contact with an obstacle.
- > Carry out a safety analysis (hazard analysis).

1.5 Environmentally conscious working

- > When disposing of the door system, separate the different materials and recycle them.
- > Do not dispose of batteries and rechargeable batteries with household waste.
- > Observe the legal regulations when disposing of the drive and batteries/rechargeable batteries.

2.1 Precautions

The installation of the door closer involves modifications to the existing body panels of the van.

There is a high risk of injury from sharp edges after machining or from the moving cutting parts of a tool.

When installing the door closer, observe the safety precautions for working with hand tools and sharp edges on drilled holes

Only use suitable tools.

Keep the work area clean and tidy while working, especially the interior of the van.

Before starting work, prepare all necessary tools and parts and remove everything else.

The proper functioning, reliability and service life of the door closer depend on compliance with all requirements specified in the instructions and on the correct placement of door closer parts and components.

Before drilling the mounting holes, mark them carefully, check the correct placement of a part or assembly, and only then drill the holes.

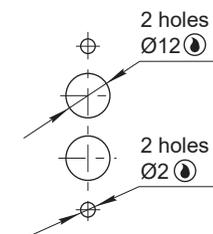
After installation, check that the part or assembly is correctly fastened.

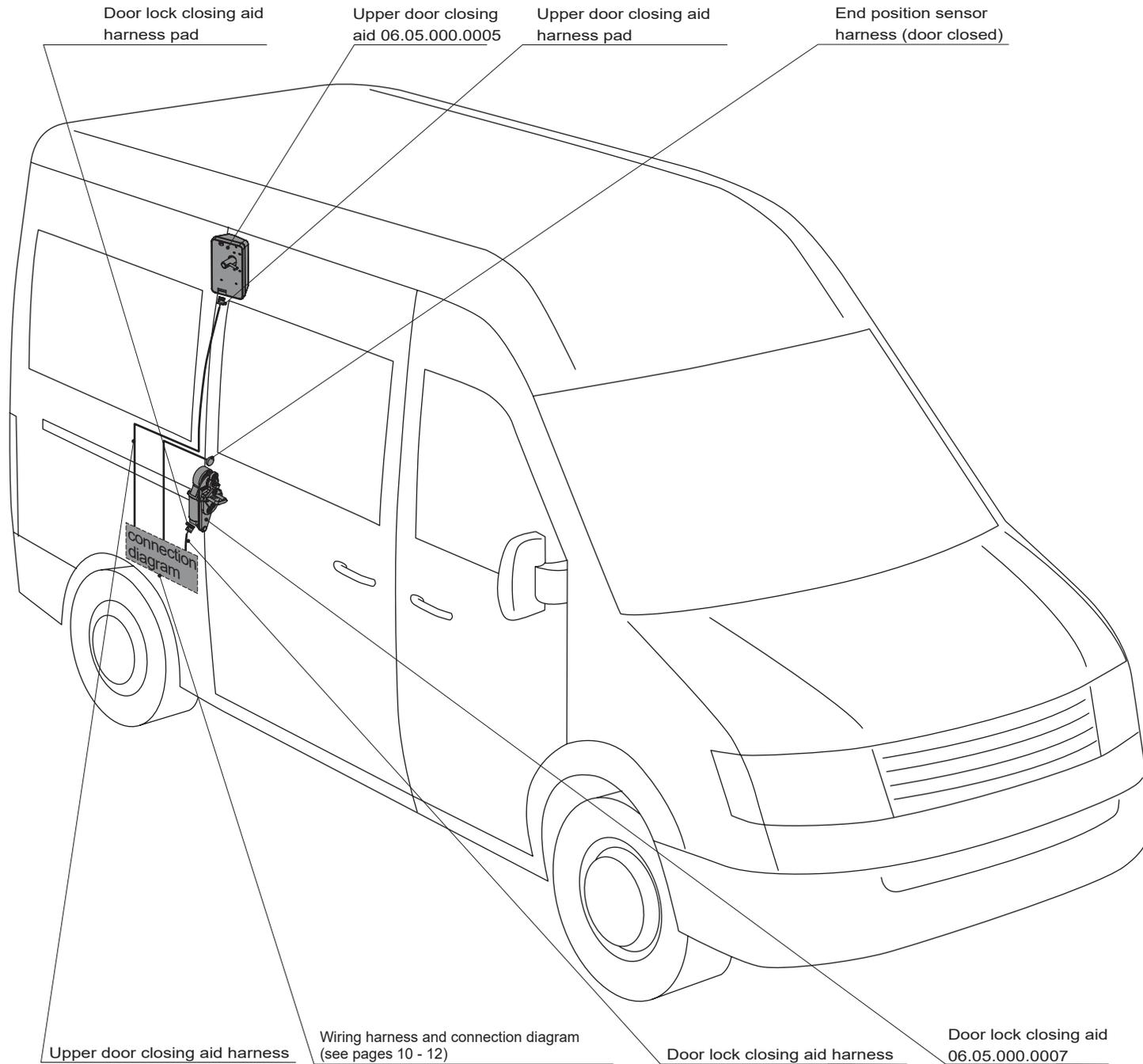
2.2 List of tools and aids

Rivet nut _____	15 pieces
Drills 2,5; 3,2; 5; 6,5 _____	1 piece each
Drill _____	1 piece
Cutter _____	1 piece
Wire for pulling through _____	3 metres
Hacksaw _____	1 piece
Blade screwdriver _____	1 piece
Hammer _____	1 piece
Clip remover _____	1 piece
Center punch _____	1 piece
Combination pliers _____	1 piece
Cross-slotted screwdriver _____	1 piece
Torch _____	1 piece
Spanner wrenches, Open-end wrenches _____	1 set
Knife _____	1 piece
Sliding calipers _____	1 piece
Riveter for blind rivet nuts Gesipa GBM10 _____	1 piece
Set of interchangeable heads 10 up to 17 mm _____	1 piece
Ratchet _____	1 piece
Industrial spirit _____	1 bottle
Set of Allen keys _____	1 set
Set of Torx bits _____	1 set
Cutting nippers _____	1 piece
Metal ruler _____	1 piece
Taper drill 4 up to 24 mm or peeler drill _____	1 piece each
Electrical socket extender _____	1 piece

There may appear some edge fin after making holes, finally it leads to the damage of the paint coat. There are symbolic notations on the places where some treatment is required:

-  --- Remove edge fin
-  --- Unedge
-  --- Treat with acid-free antirust liquid





3.1 Product description

These door closer models enable the right-hand sliding door to be pulled into the door lock and the upper section on vans:

MERCEDES SPRINTER (906, 907) 2006 - present
VOLKSWAGEN CRAFTER 2006-2018

Positioning of the upper and lower door closers

The placement of the cable harnesses and closers is shown in the illustration.

Use steel wire to lay the cable harness of the upper door closer in cavities.

Be careful when laying the cable harness so as not to damage the insulation of the cables.

! All cables must be securely protected and firmly attached to prevent the possibility of breakage, chafing or wear.

i The durability and reliability of door closers depend directly on the quality of their installation.

3.2 Technical data

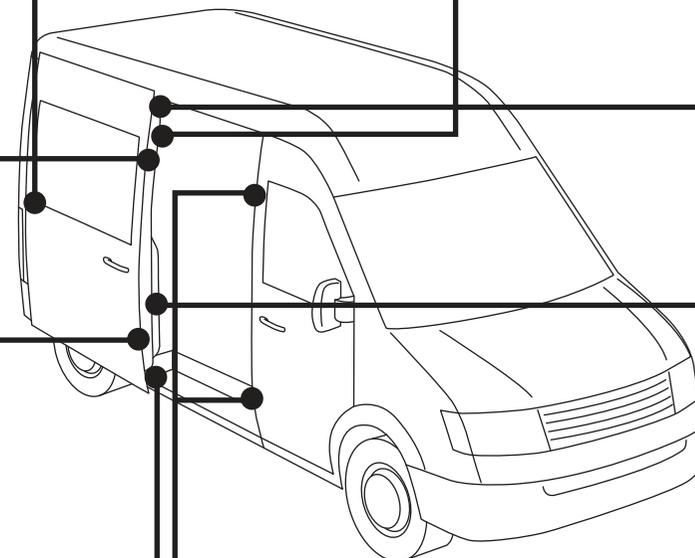
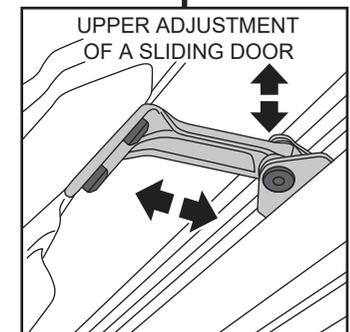
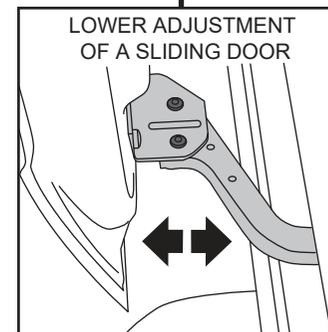
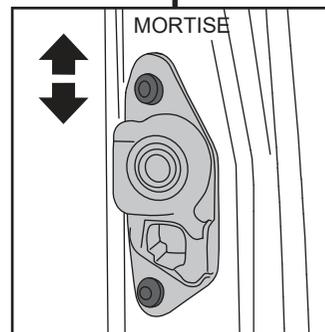
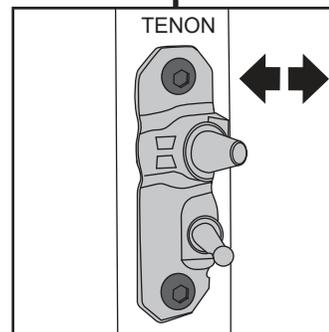
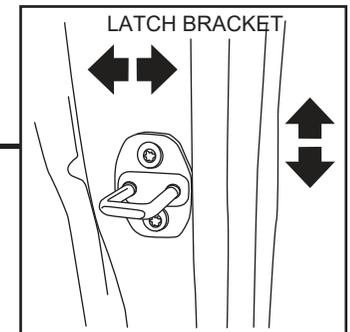
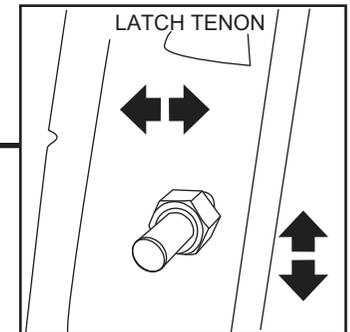
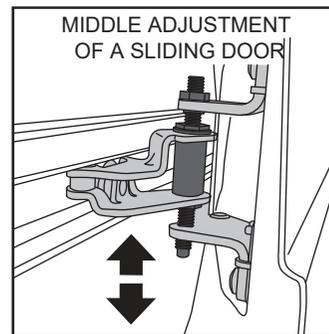
Power consumption (rating)	150 W
Power consumption (max)	240 W
Unlocking and locking time of the sliding door	~ 2 sec.
Category temperature range	-25°C up to +40°C
Türöffnungen pro Tag	up to 1.000 times
Resources	Not less than 300.000 cycles

4 Installation

4.1 Instructions before starting installation

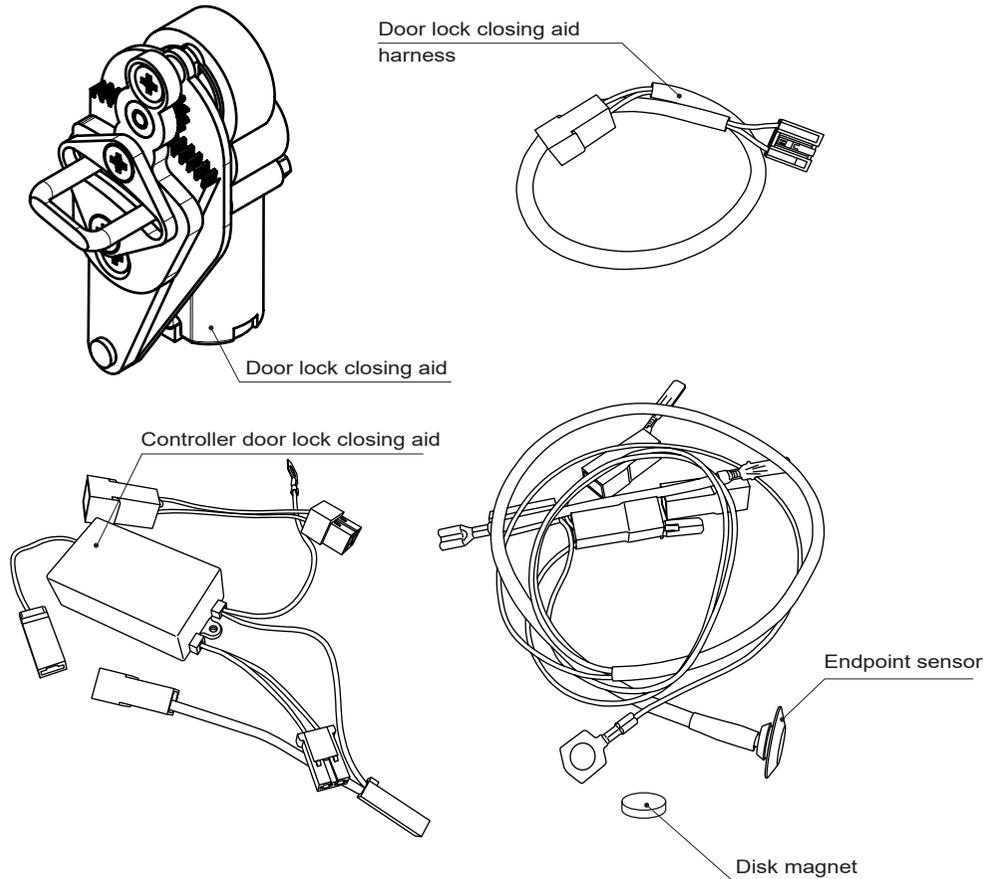
Before installing the drive, adjust the minibus's door because its adjustment influences the drive operation.

1. Wash out the door carriage guides with petrol and wipe them with dry rags.
2. Wash out the door latch mechanism, dry it and lubricate with WD-40.
3. Remove door tenons.
4. Adjust the door position in relation to its doorway (it is adjusted with the carriages). The closed door must not sag or go inwards minibus overly.
5. Adjust the latch tenon and latch bracket on the rear post in such way that it provides the minimum possible closing speed.
6. Check the sealing material when the door is closed. The sealing material must not shrink overly. Otherwise remove the sealing material and unbend its edge in the compressed places.
7. Install the door tenons, adjust their position.
8. Open and close the door when the bus is motionless.
9. Make sure that the sliding door retainers are in their positions and have no any visible damage or wear. Do not use the minibus without retainers or with damaged sliding door retainers.
10. Check the upper, middle and lower door adjustments. The door must go along the door guide easily without any jerks and knocks, it must open and close freely. The correctly adjusted door in a closed position must come to the sealing material tightly having the same equal gaps.

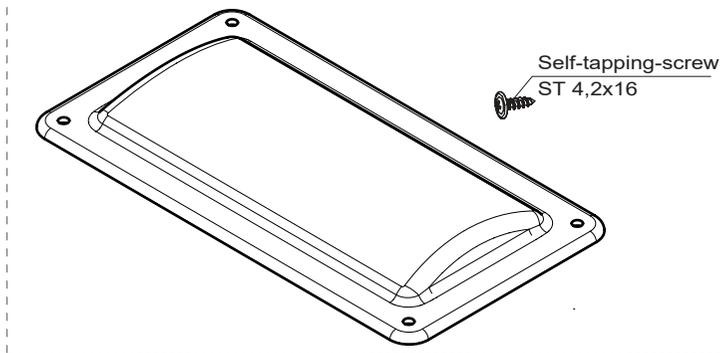


5 Product description

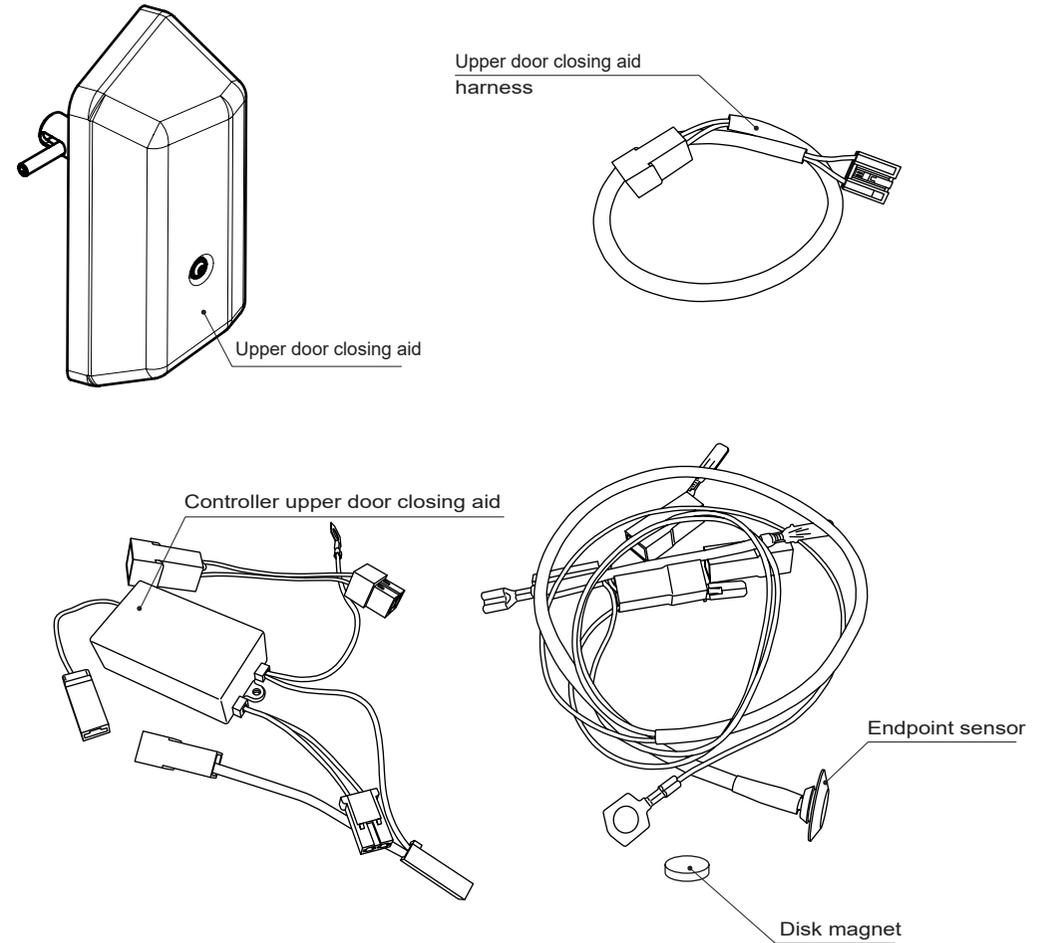
5.1 Scope of delivery door lock closing aid 06.05.000.0007 .



Rack cover (complementary option, not included)

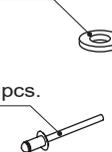


5.2 Scope of delivery upper door closing aid 06.05.000.0005

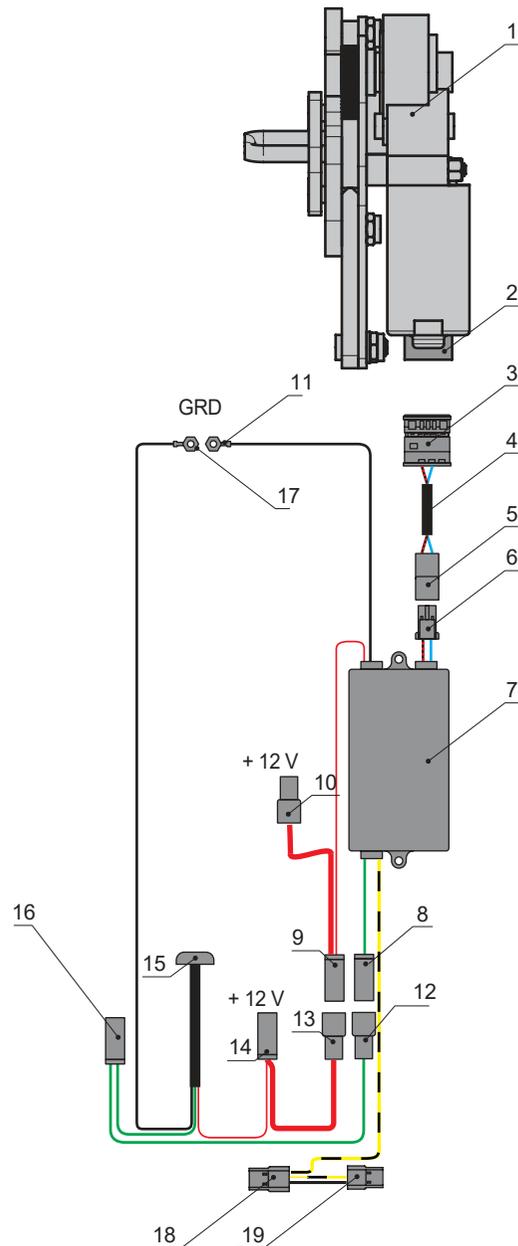


Flat washer 6x18x1,5 - 8 pcs.

Exhaust rivet 4,8x12 - 4 pcs.

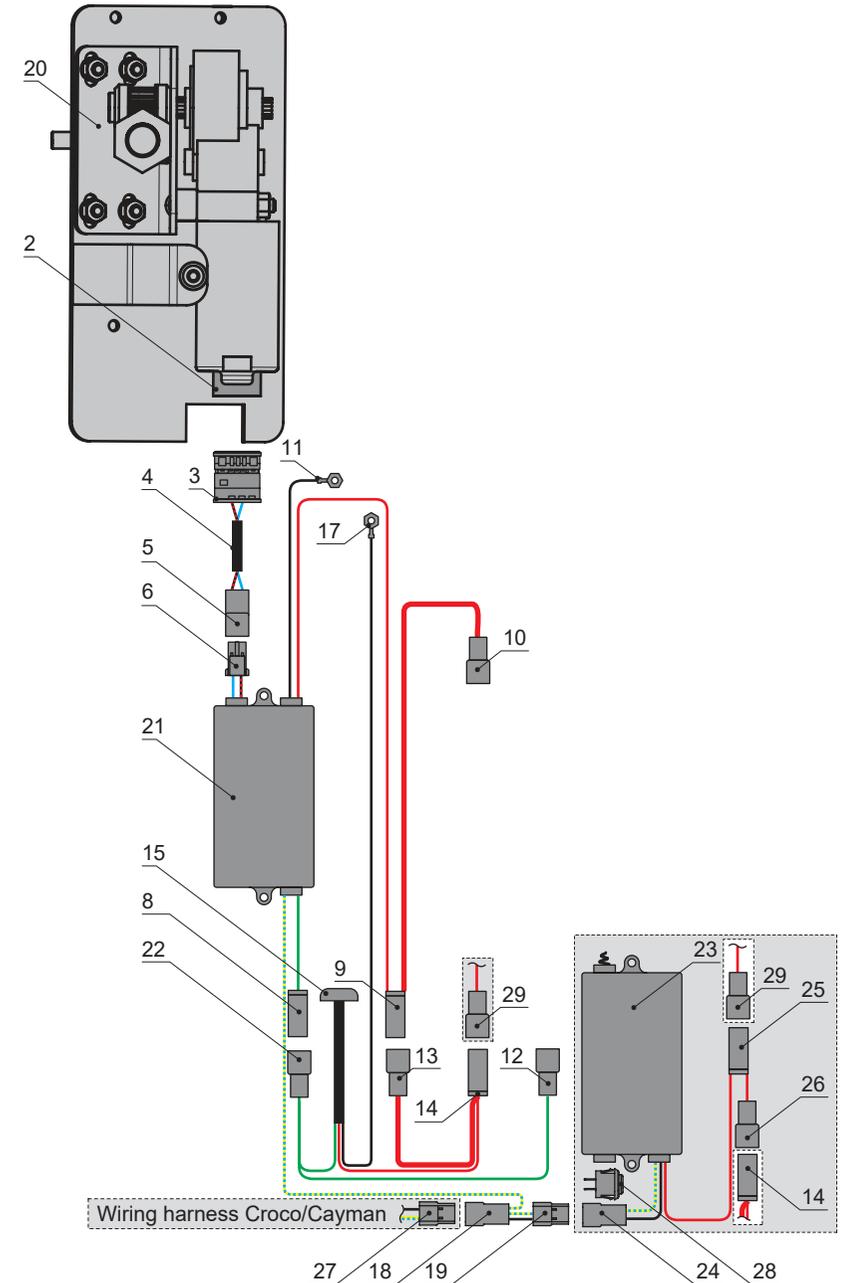


6.1 Door lock closing aid 06.05.000.0007



1. Door lock closing aid
 2. Socket closing aid
 3. Plug wiring harness
 4. Wiring harness
 5. Flat plug wiring harness
 6. Flat plug sleeves controller
 7. Controller door lock closing aid
 8. Flat plug sleeve for sensor
 9. Flat plug sleeve +12V supply
 10. Flat plug +12V supply
 11. Clamp to vehicle ground '-'
 12. Flat plug wiring harness sensor, green
 13. Flat plug +12V supply sensor
 14. Flat plug sleeve +12V supply, as 10.
 15. Sensor end position
 16. Flat plug connection upper door closing aid, green
 17. Terminal for vehicle ground '-'
 18. Flat plug wiring harness Croco/Cayman, upper door closing aid only
 19. Flat plug sockets, upper closing aid only
 20. Upper door closing aid
 21. Controller upper door closing aid
 22. Flat plug connection for upper door closing aid controller
- Optional connection:
23. Croco/Cayman receiver
 24. Flat plug receiver remote control
 25. Flat plug sleeve +12V supply
 26. Flat plug +12V supply
 27. Flat plug sleeve wiring harness Croco/Cayman
 28. Button for Croco/Cayman
 29. Flat plug sleeve +12V wiring harness Croco/Cayman

6.2 Upper door closing aid 06.05.000.0005



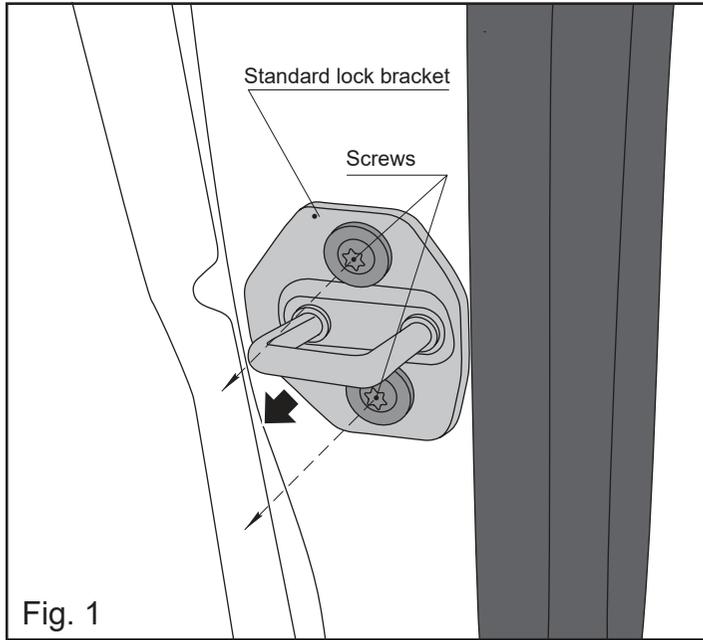


Fig. 1

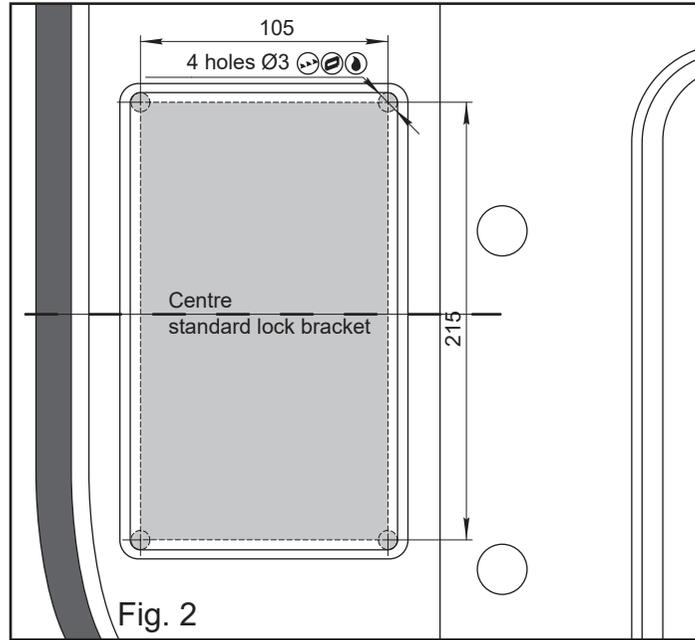


Fig. 2

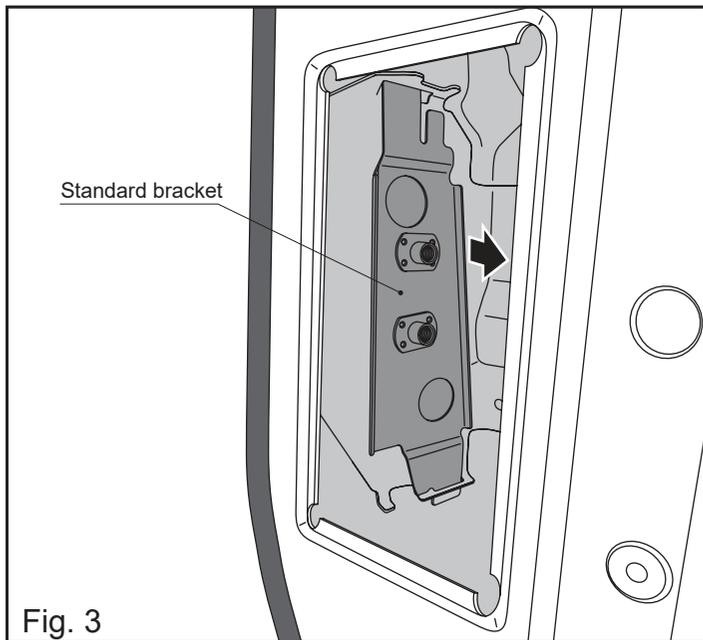


Fig. 3

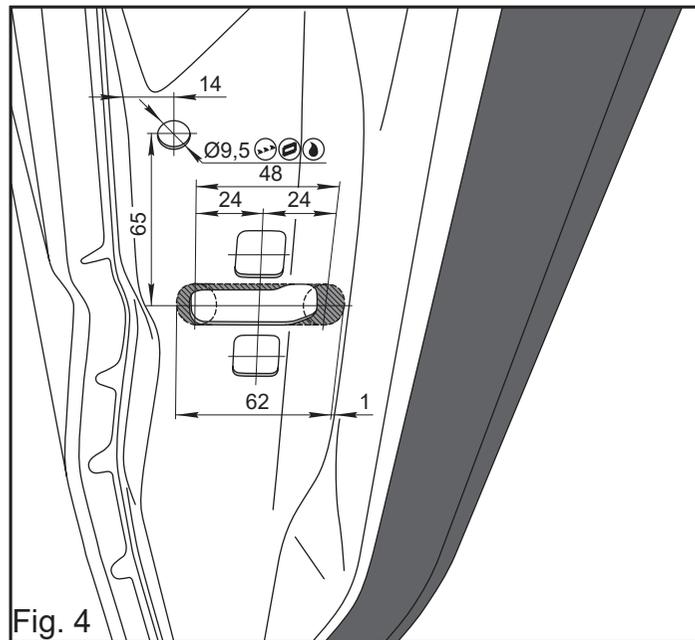
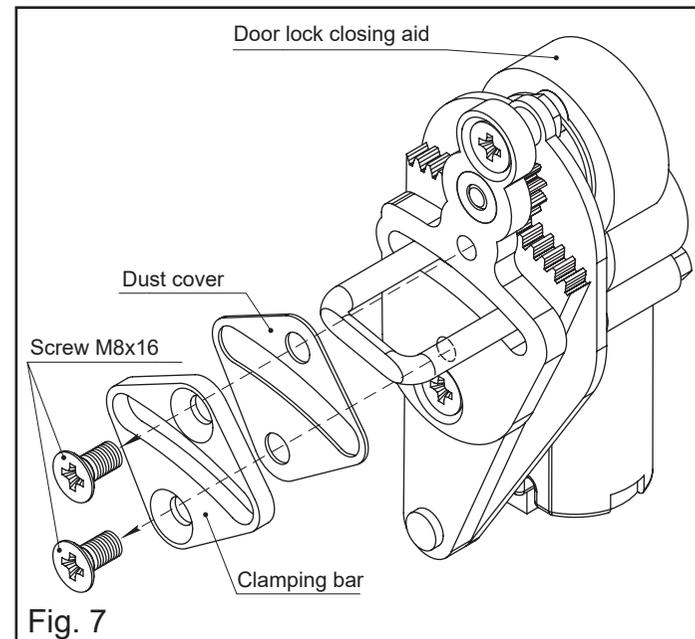
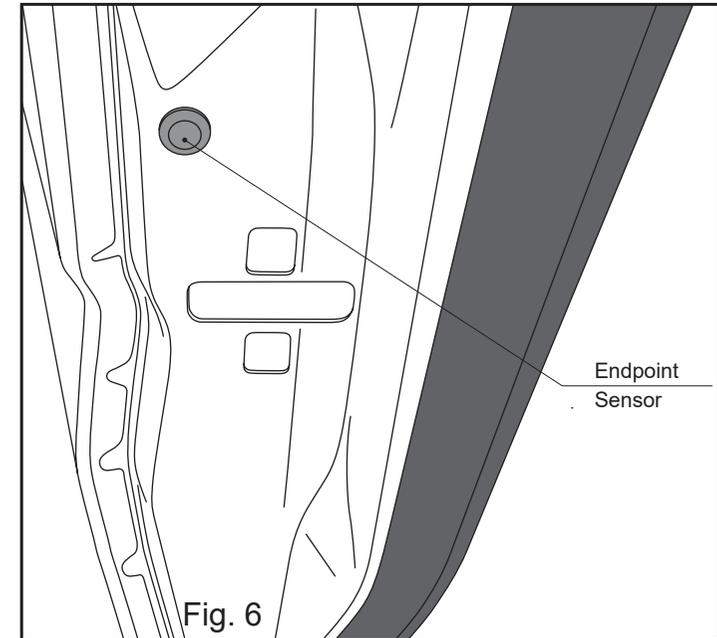
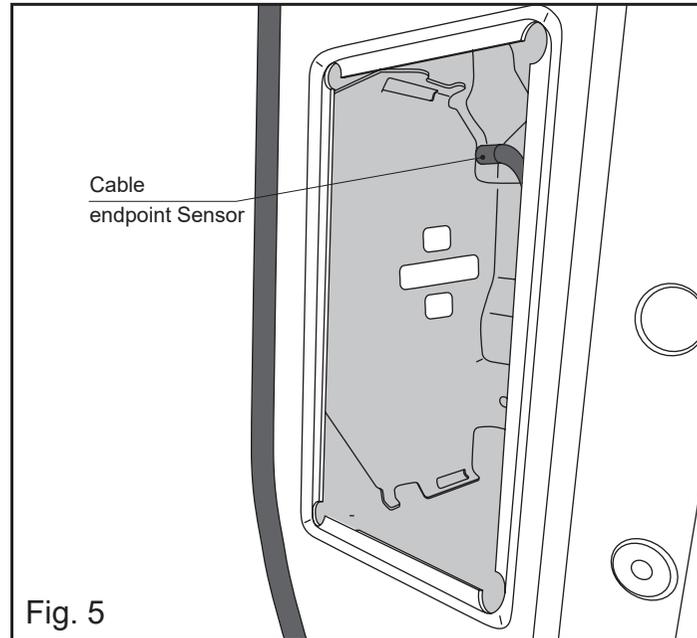


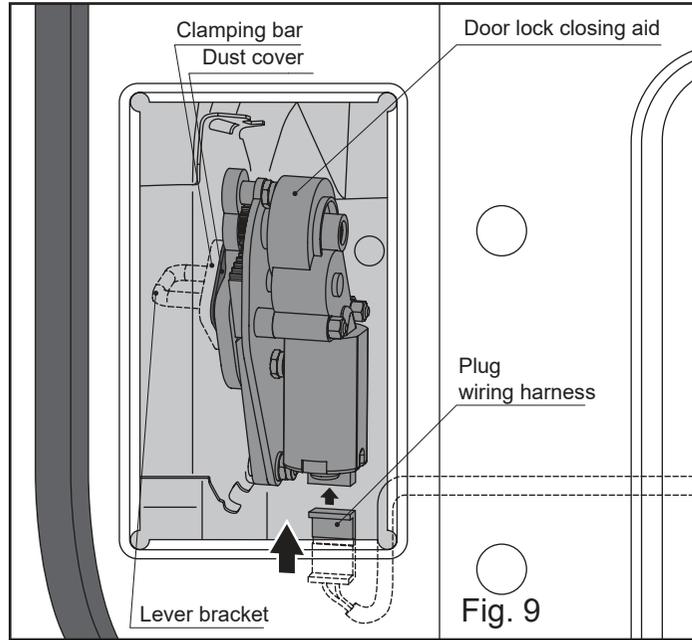
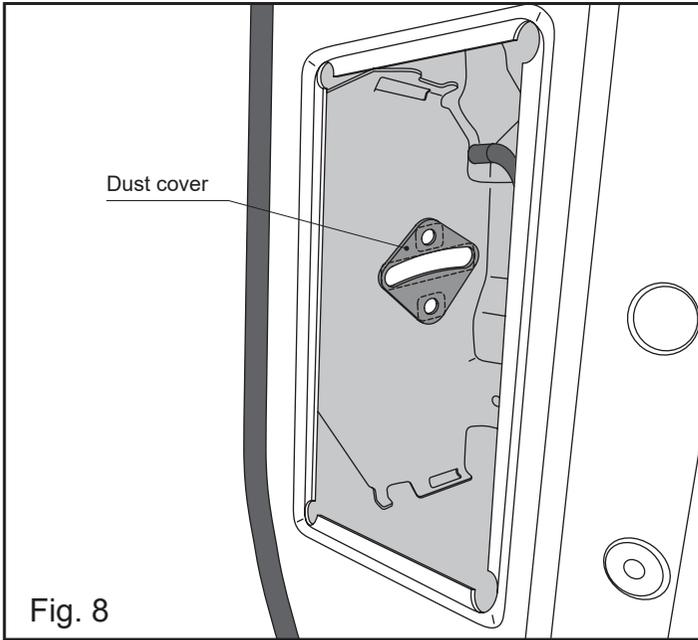
Fig. 4

7.1 Door lock closing aid

1. Remove the standard lock bracket by removing the two fixing screws (Fig. 1).
2. Make a rectangular cut-out measuring 105 mm x 215 mm.
To do this, transfer the centre of the standard lock bracket to the inner surface of the C-pillar (Fig. 2).
3. Drill a Ø3 mm hole in the corners of the cut-out (Fig. 2).
4. Remove the standard bracket (Fig. 3).
5. Widen the slotted hole in the body panel to 62 mm. The centre of this widening is the centre of the rectangular openings. The height corresponds to the existing opening (Fig. 4).
6. Drill a Ø9.5 mm hole in the body panel according to the specified dimensions (Fig. 4).

1. Secure the sensor endposition by carefully pushing the cable through the drill hole from the outside (Figs. 5 and 6).
2. Unscrew the clamping bar and dust cover from the door lock closing aid (Fig. 7).

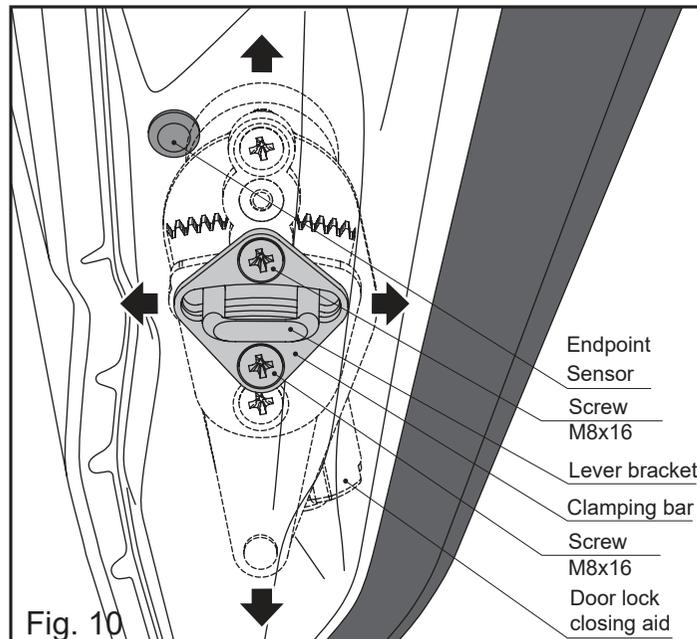




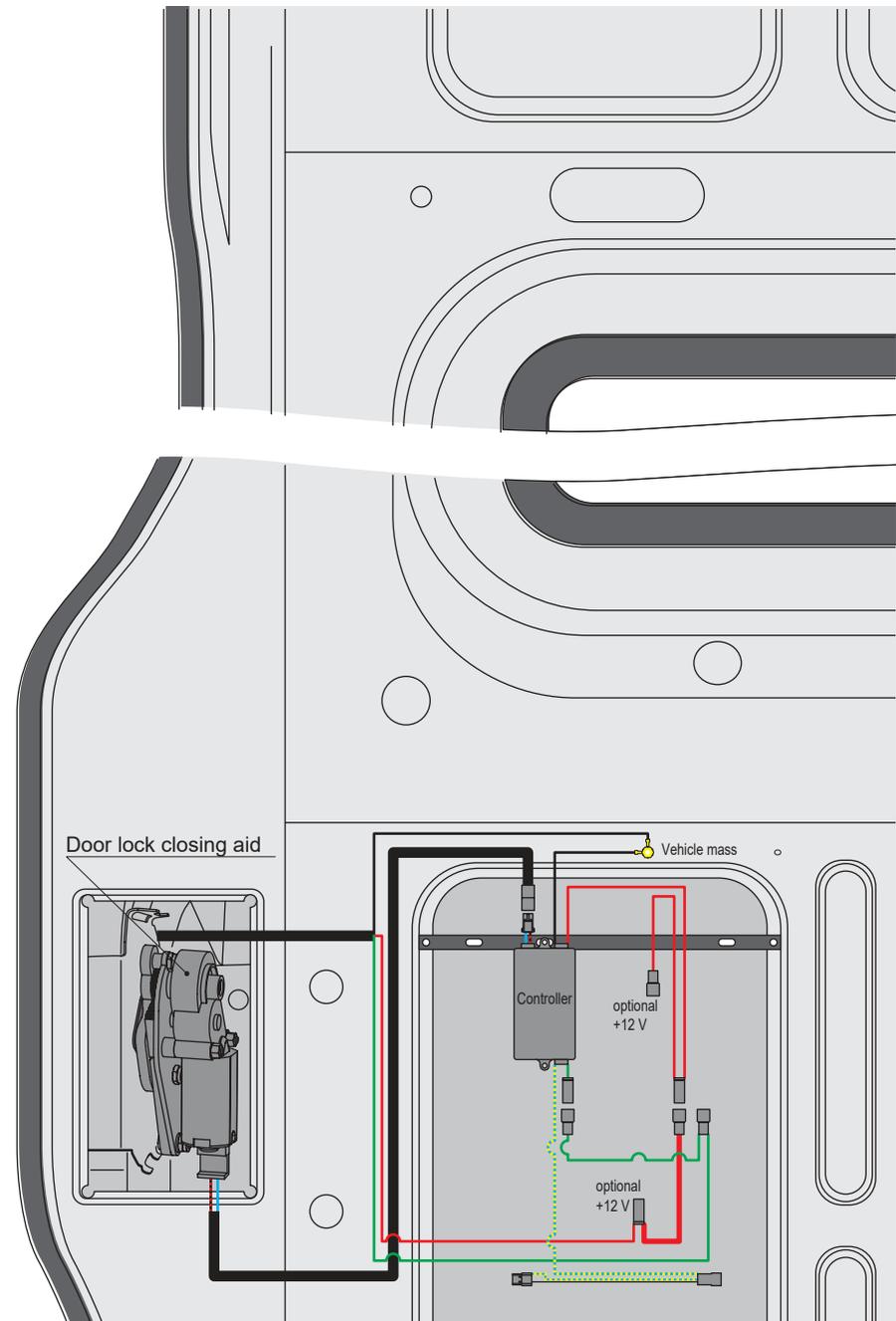
! The dust cover must be on the inside of the body pillar (Fig. 8).

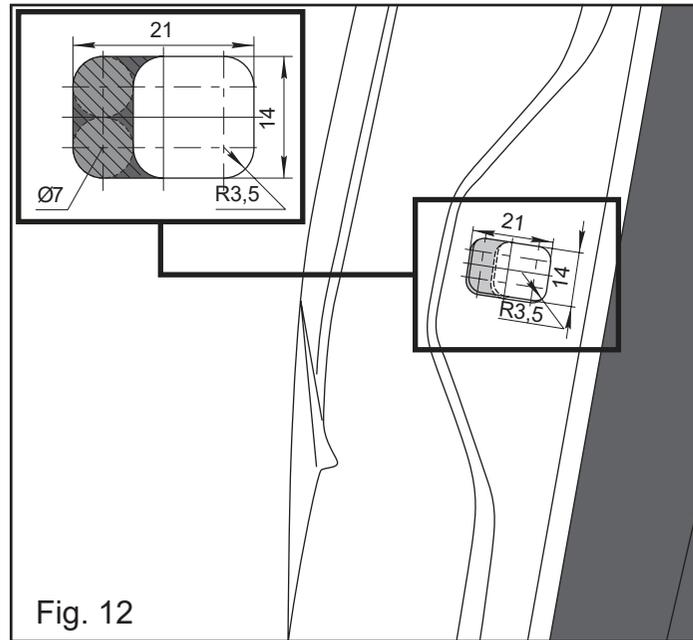
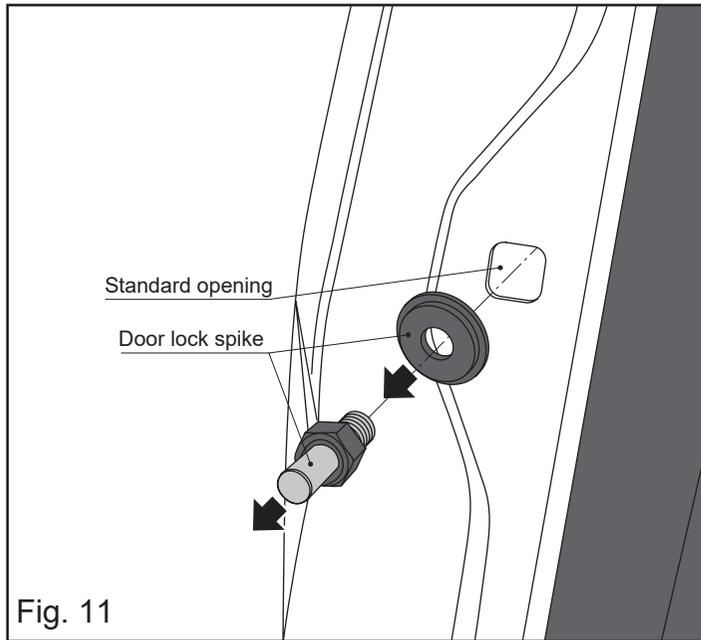
Insert the door lock closing aid through the cut-out and secure it with the two M8x16 screws (Figs. 9 and 10).

! If necessary, you can adjust the position of the door lock closing aid by loosening the two screws (Fig. 10).



1. The recommended placement of the controller is shown in the illustration on the right.
2. Connect the door lock closing aid in according to the wiring diagram on page 8.



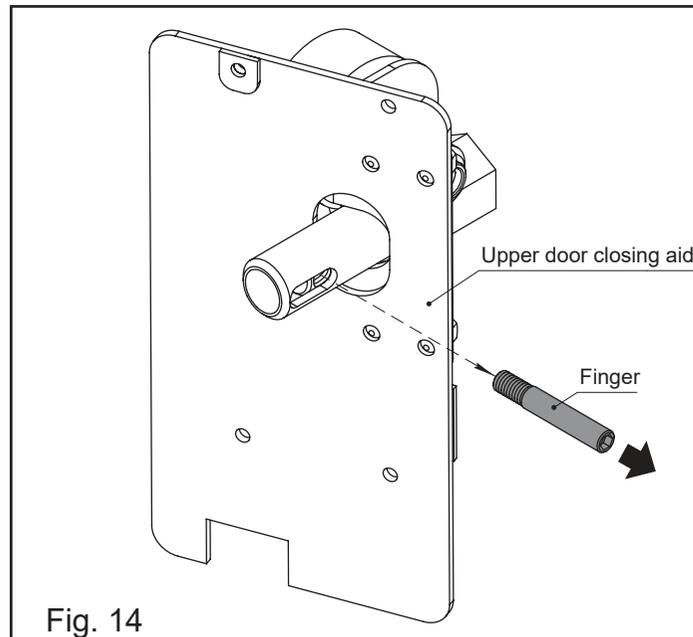
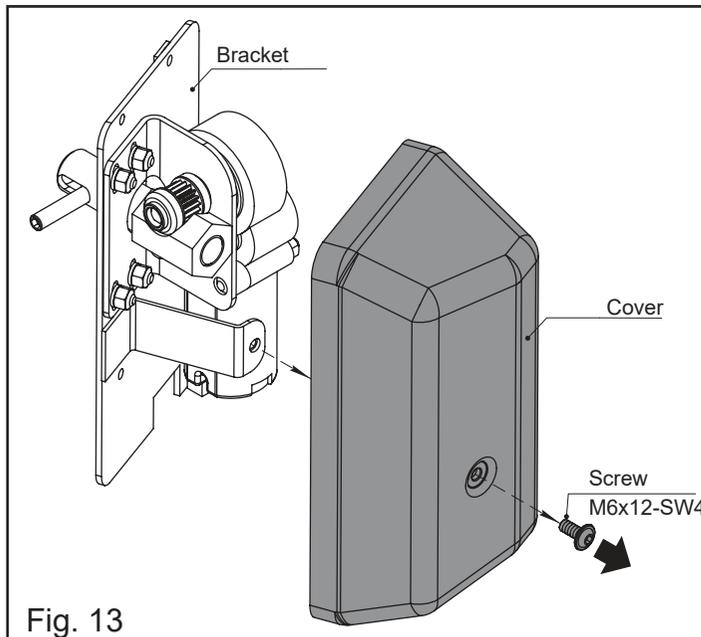


7.2 Upper door closing aid

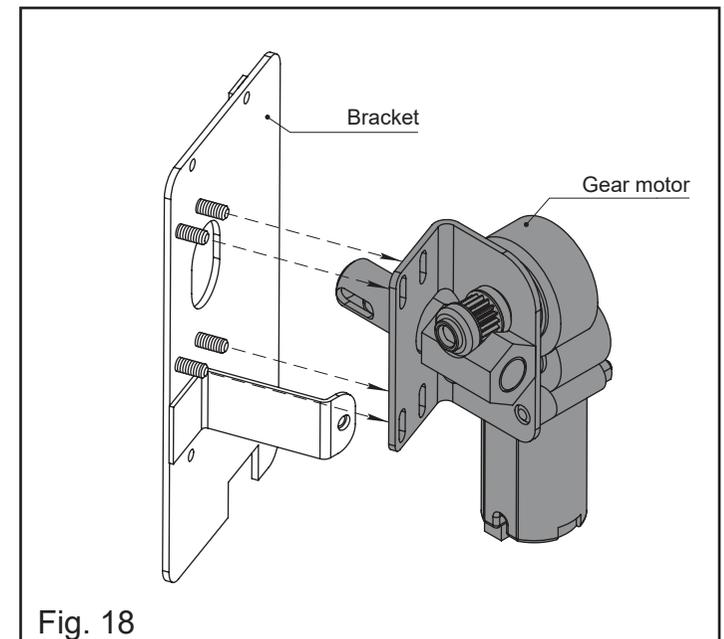
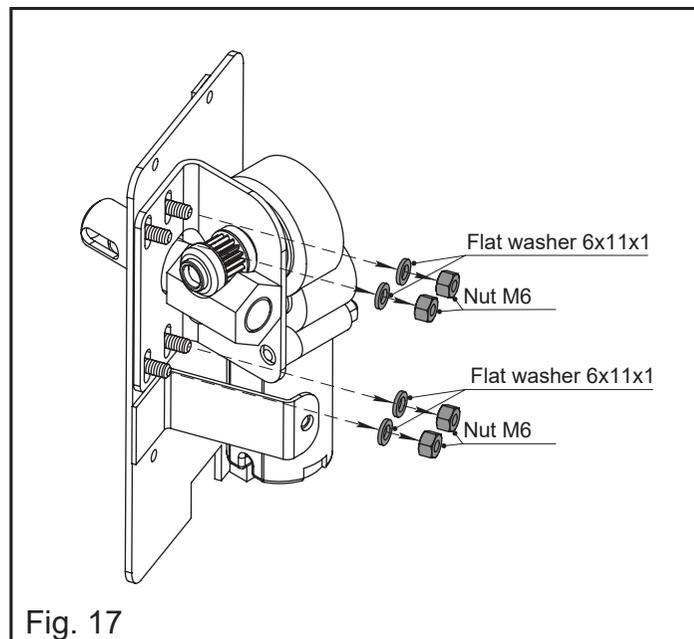
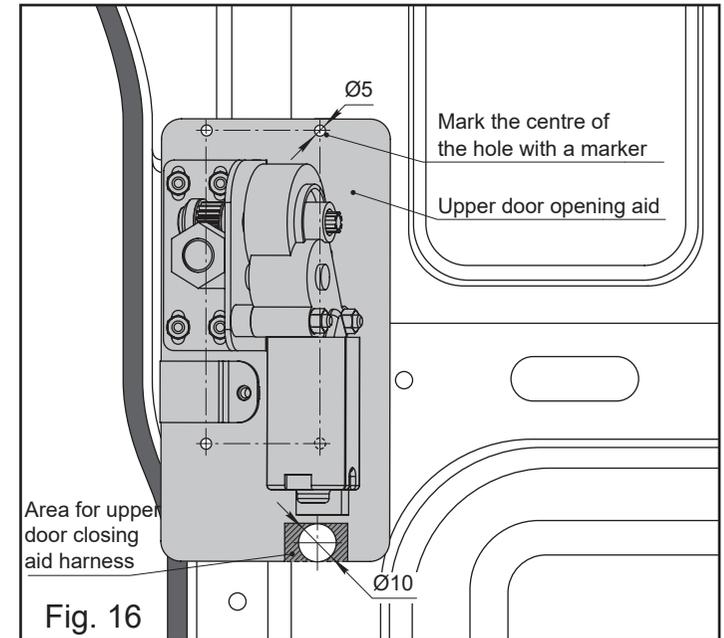
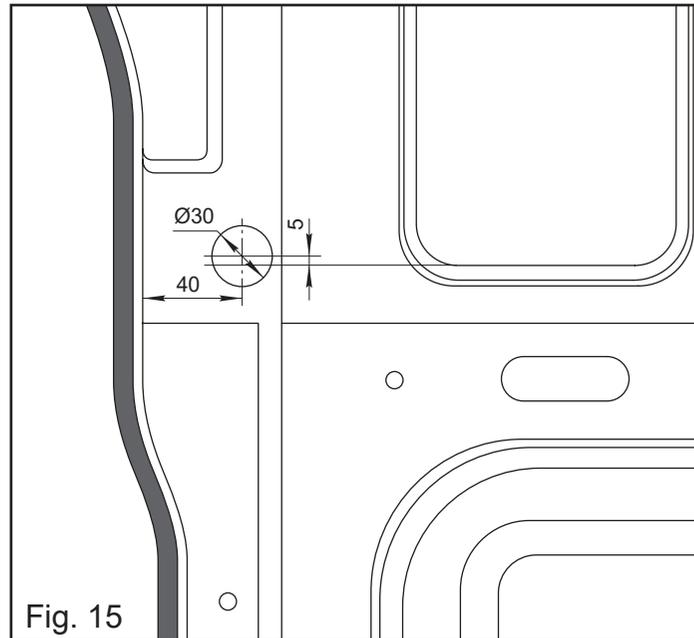
1. Remove the standard spike from the upper lock on the C-pillar of the door opening (Fig. 11).
2. Modify the standard hole for the movable finger of the upper door closing aid (Fig. 12).

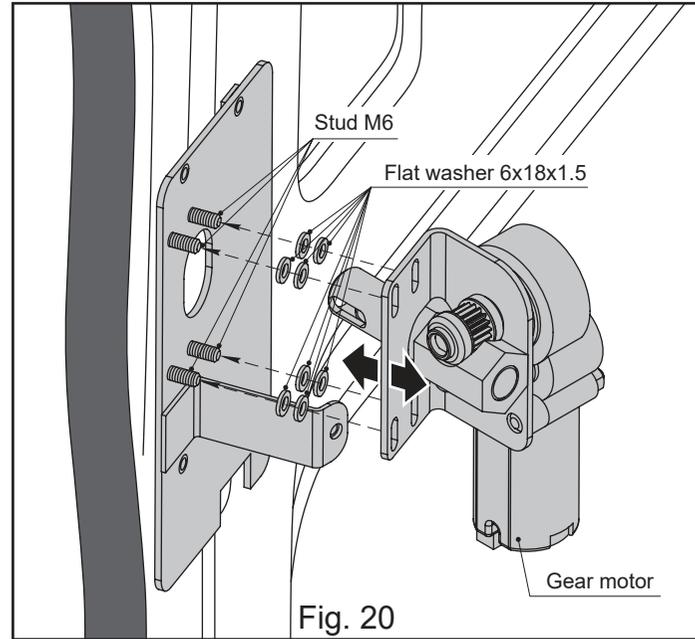
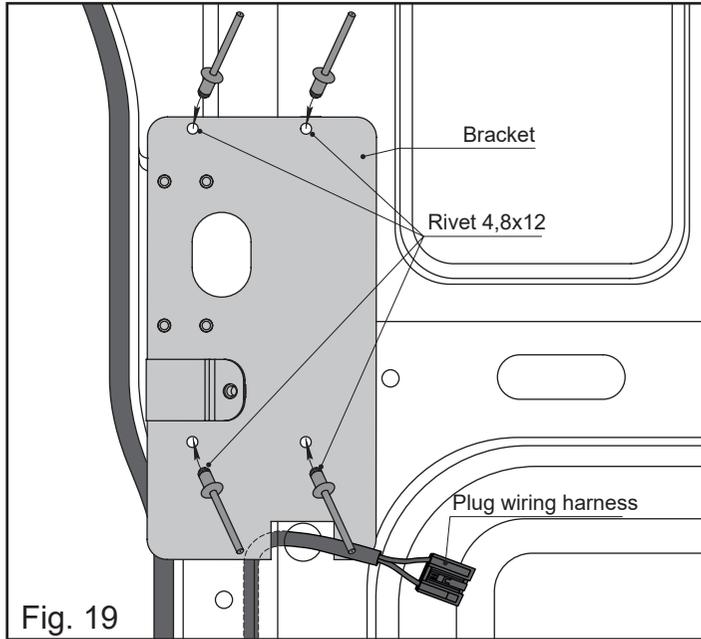
⚠ Before installing the upper door closing aid, it is necessary to remove the protective cover from the bracket by first unscrewing the M6x12 screw (Fig. 13).

3. Unscrew the finger of the upper door closing aid (Fig. 14).

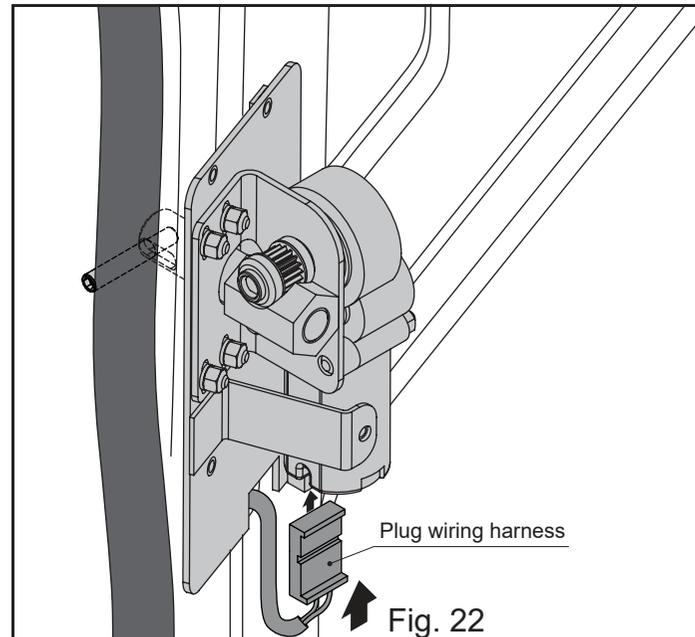
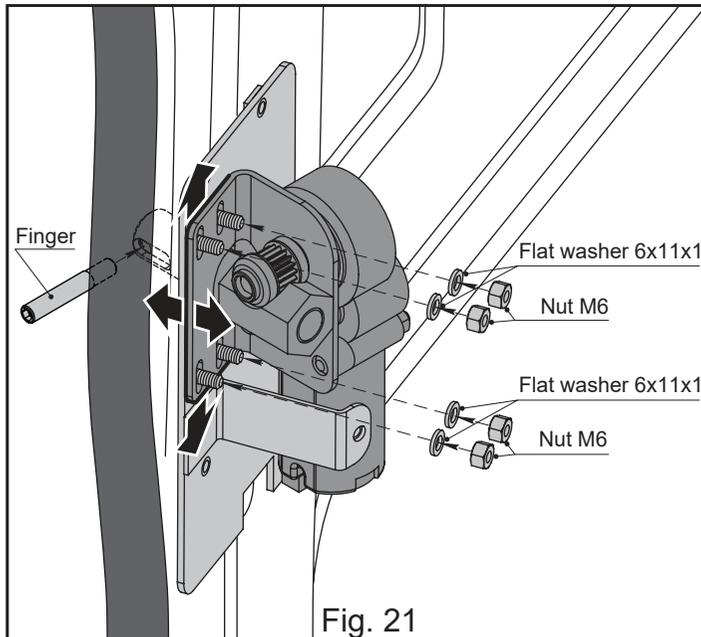


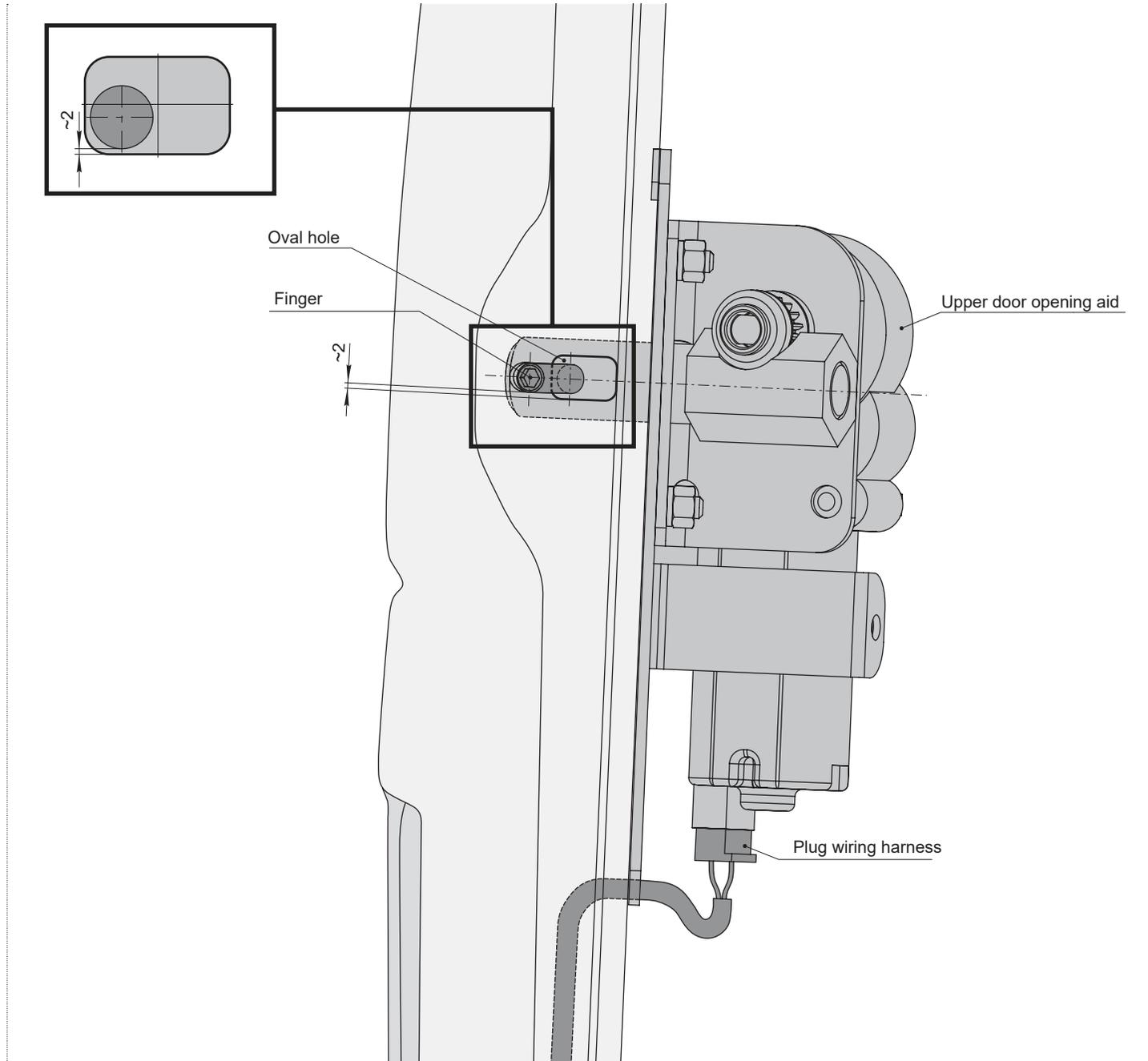
1. Mark the centre of the hole with a marker (Fig. 15).
Drill a hole $\varnothing 30$ mm.
2. Insert the upper door closing aid into the hole and attach it to the C-pillar.
To do this, mark the centre of the four mounting holes for the $\varnothing 5$ hole with a marker.
NOTE: You can only mark the lower right mounting hole after step 6.
3. For the door closer cable, mark the centre of the hatched area with a marker (Fig. 16).
4. Remove the upper door closing aid (Fig. 16).
5. Drill the four $\varnothing 5$ mm holes and one $\varnothing 10$ mm hole.
Secure the base plate with 4.8x12 rivets,
included in the scope of delivery (Fig. 16).
6. Separate the gear motor from the bracket by
unscrewing the M6 nuts (Figs. 17 and 18).

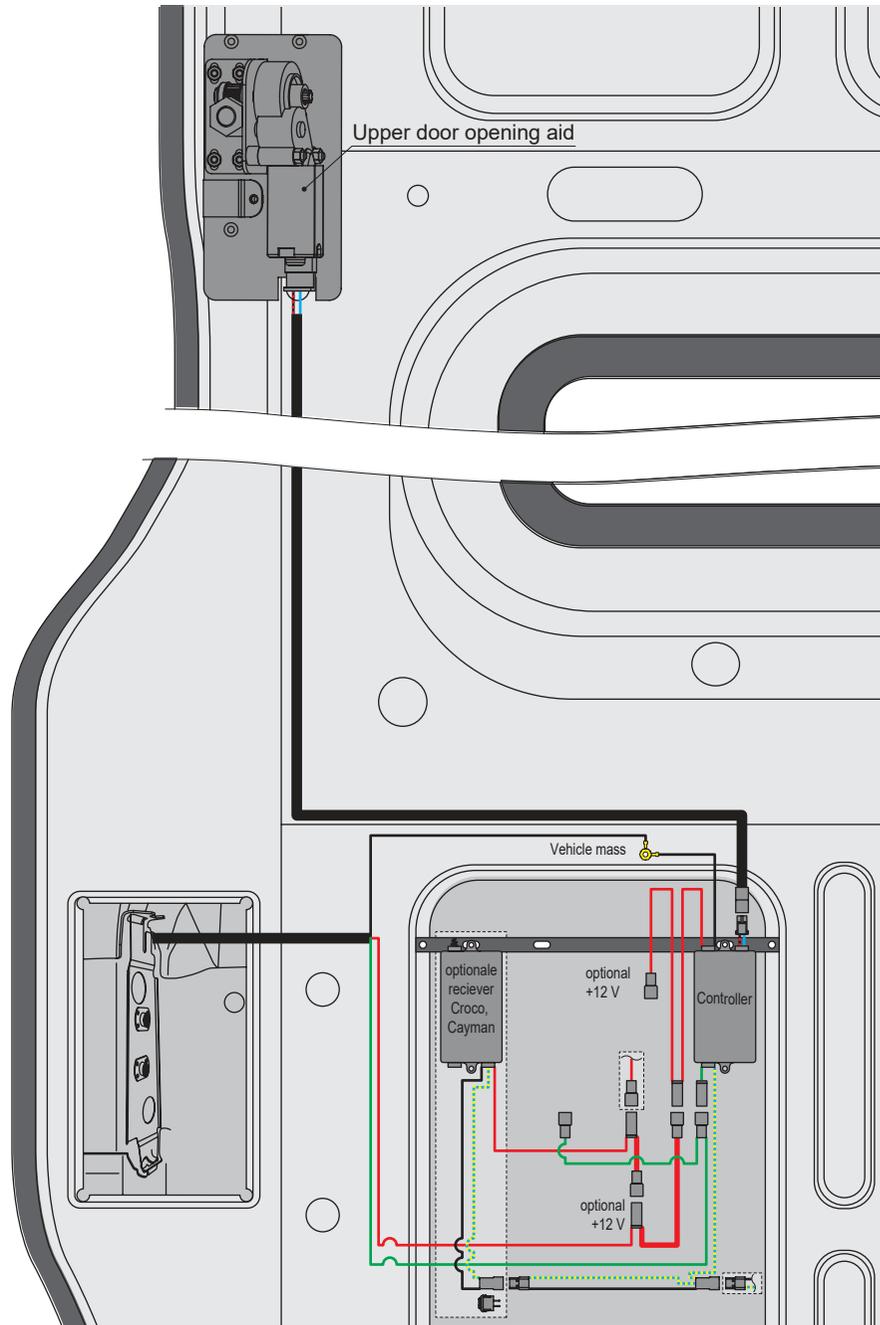




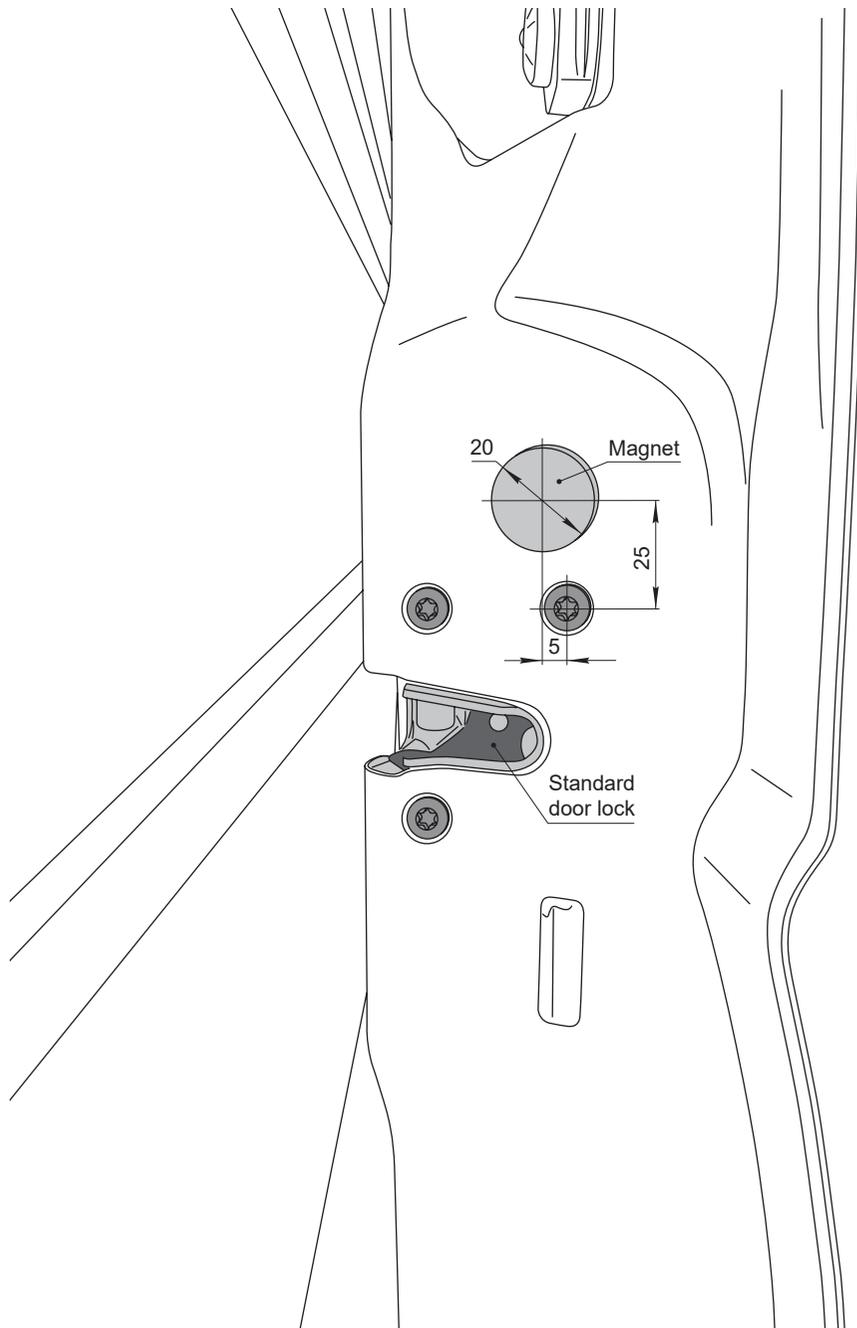
1. Rivet the bracket to the C-pillar using 4.8x12 rivets (Fig. 19).
2. Place the gear motor with the 6x18x1.5 flat washer included in the scope of delivery onto the M6 bolts of the base plate (Fig. 20) and fasten the finger to the door closer through the oval hole on the body rack (Fig. 21).
3. Clamp the finger so that it is on the left edge of the elongated hole (Figs. 21 and 22).
4. It is also necessary to observe the technical gap between the finger and the lower edge of the elongated hole, ~2 mm, see Fig. 12 on page 13 and Fig. on page 16.
5. Pull the cable harness of the door closer through the $\varnothing 10$ mm hole (Figs. 16 and 22) and insert the plug into the socket of the gear motor (Fig. on page 16).







1. The recommended placement of the controller is shown in the illustration on the left.
2. Connect the upper door closing aid in accordance with the wiring diagram on page 8.



! Before installing the upper door closing aid, it is necessary to remove the protective cover from the bracket by first loosening the M6x12 screw (Fig. 13).

! Adjust the position of the magnet so that the door closer begins to pull the door when the locking bolt is fully engaged (2 clicks) and pulls the door completely shut.

Attach the magnet to the front of the door in accordance with the recommended dimensions and stick the magnet in place using double-sided adhesive tape, as shown in the illustration on the left.

The area of the magnet marked in yellow faces outwards. Once attached, this must be removed.

FIRST START

Sliding door is open. Connect +12V. At the same time, the door closers must move to their outer position.

Close the sliding door. At the same time, the door closer must move to their inner position and close the door completely.

Open the sliding door. At the same time, the door closer must move to their outer position.

! If the sliding door is not sufficiently tightened into the doorway or, conversely, excessively retracted into the doorway, it is necessary to adjust the position of the upper door closing aid, (Fig. 10, page 11) and lower (Fig. 21, page 15).

9 Information

For warranty claims and service enquiries, please contact our representative in Germany.

Ador Europe
c/o BBT Sauer Engineering Office

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