

FOR RECYCLING PURPOSES ONLY

Disassembly Instructions

Automatic Transfer Switches

TruONE™ ATS, OX_ 400–1600_



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Important information

This document shows the disassembly process of TruONE™ ATS OX_ 400–1600_ automatic transfer switches. Accessories, such as electronic accessories Ekip com or signalling modules, auxiliary power supply module, shrouds, phase barriers and auxiliary contacts are not included. **Note! This document is for recycling purposes only.**

Safety Notes

Before starting the disassembly process it is mandatory to disconnect all sources of electrical supply and make sure that all circuits are completely de-energized.

Disassembly of automatic transfer switches must be performed by qualified and skilled personnel in the electrical field (IEV 195-04-01: person with relevant education and experience to enable him or her to perceive risks and to avoid hazards which electricity can create) and having a detailed knowledge of automatic transfer switches.

Disassembly must be done in an ergonomic workspace which can ensure the protection of the person doing the disassembling.

Applicable national legislation and international standards in force at the time of the disassembly of the automatic transfer switch must be taken into account in addition to the prescriptions illustrated in this document.

ABB declines any responsibility for injury to people or damage to property resulting from a failure to comply with the instructions set out in this document and with any applicable safety standard.

Personal Protective Equipment (PPE)

When doing the disassembling following safety Personal Protective Equipment (PPE) must be worn:

Glasses



Gloves



Safety shoes



Protective clothes



Tools

The disassembly process requires the use of tools (e.g. screwdriver, torx key, pliers). Tools to be used are specified inside each phase of the disassembly process.

Disassembly process

For each phase of the disassembly process the following information is provided:

- Part/parts to be disassembled (title of the phase)
- Tools to be used
- Pictures showing actions to be performed
- In case of potential hazards signal below is reported:

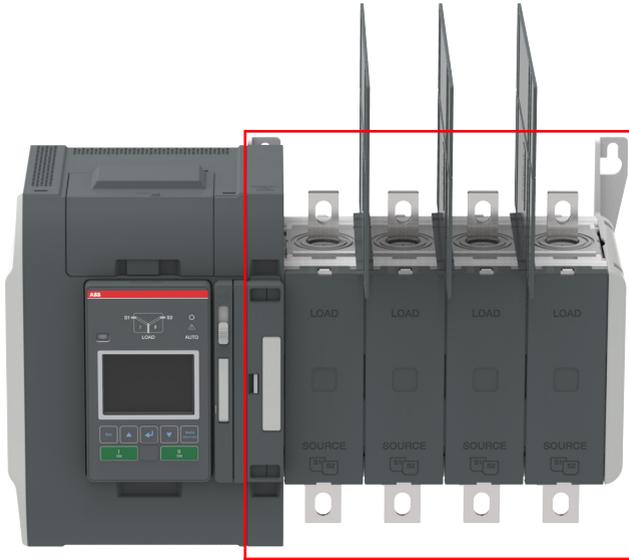


Disassembly of the automatic transfer switch

Part I – Disassembly of the mechanism, power module and controller module



Part II – Disassembly of the poles, position indicator and sensor module

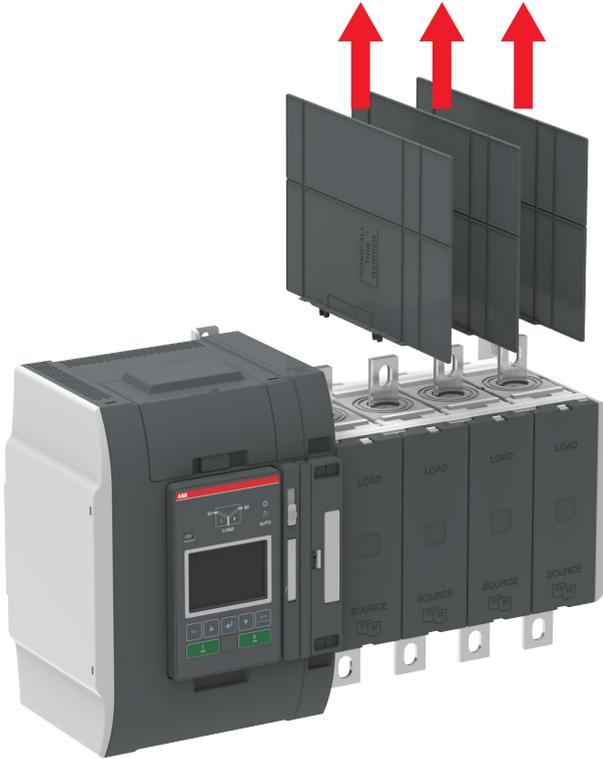


Part III – Disassembly of the HMI

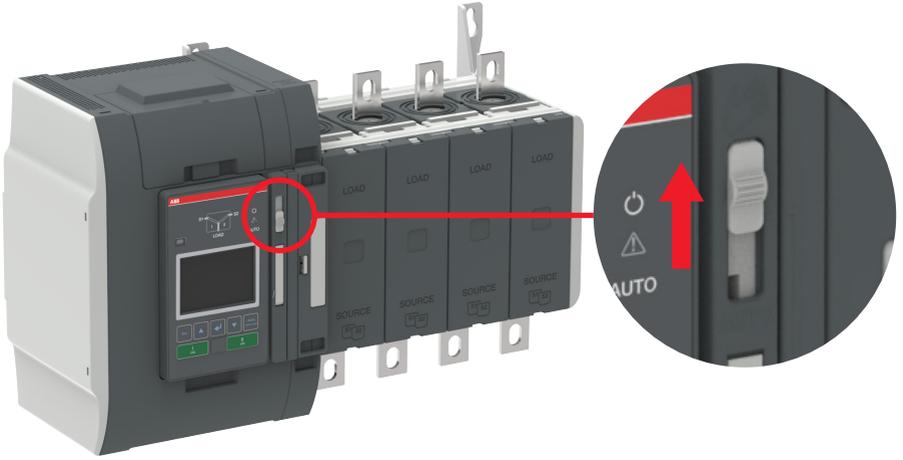


Part I – Disassembly of the mechanism, power module and controller module

1



2



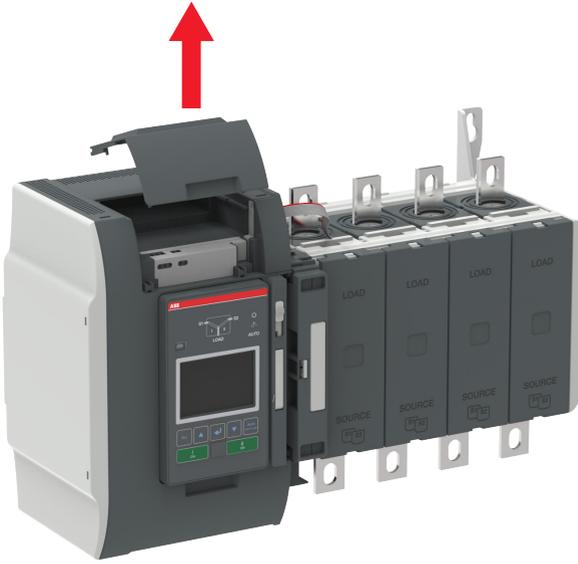
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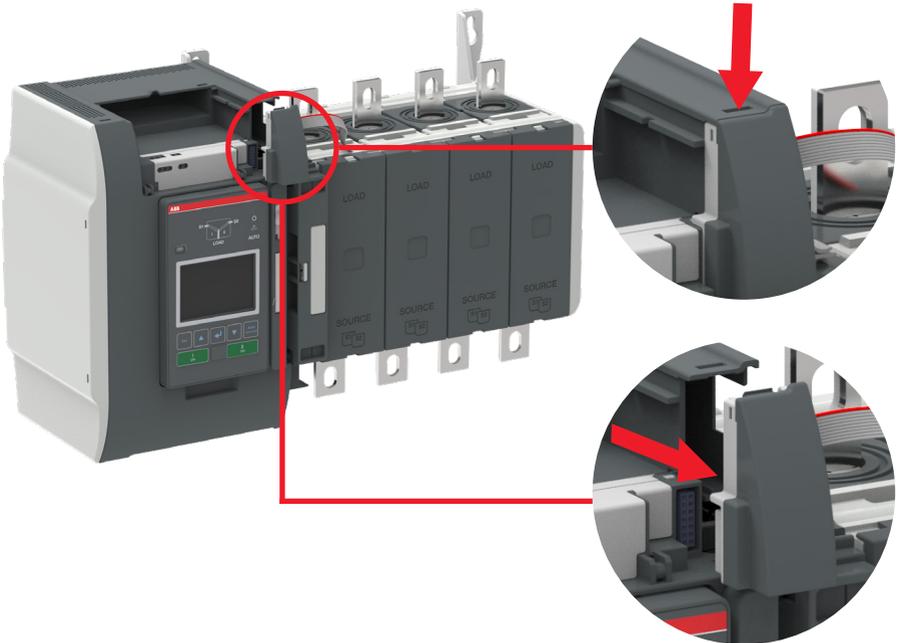
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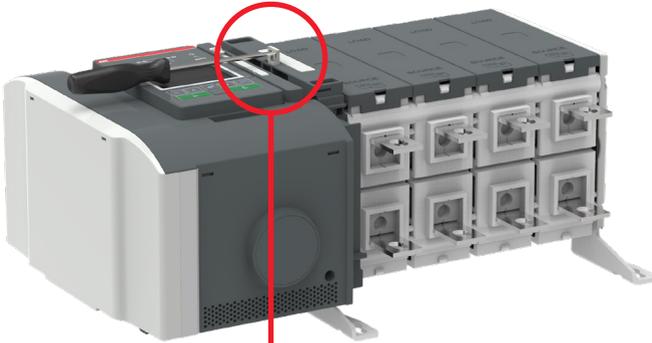
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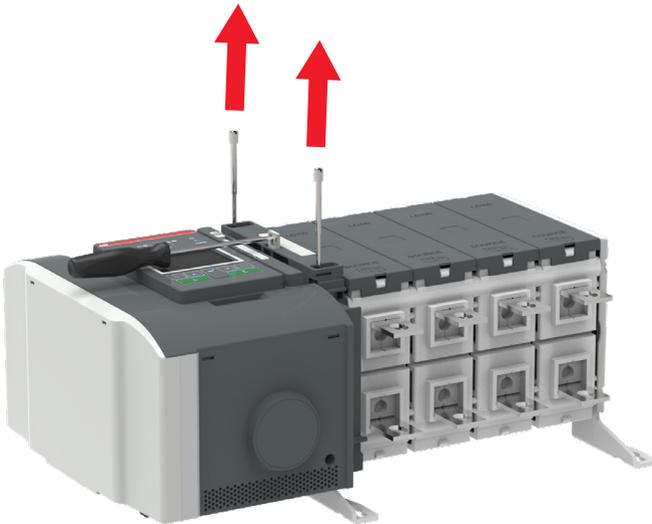
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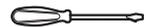
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Tools
Flat screwdriver



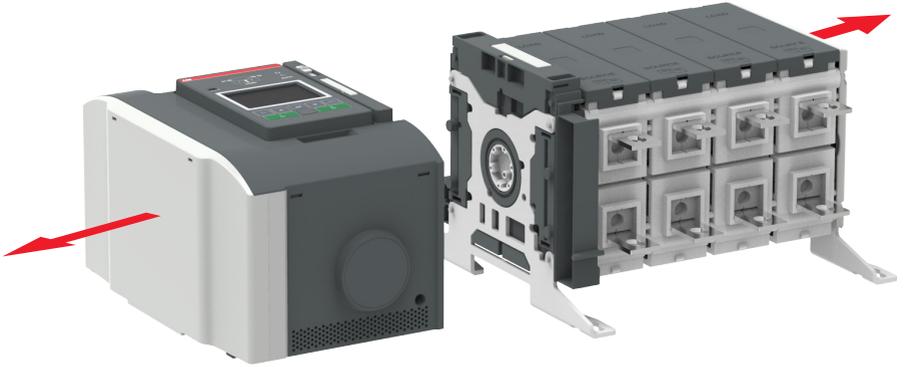
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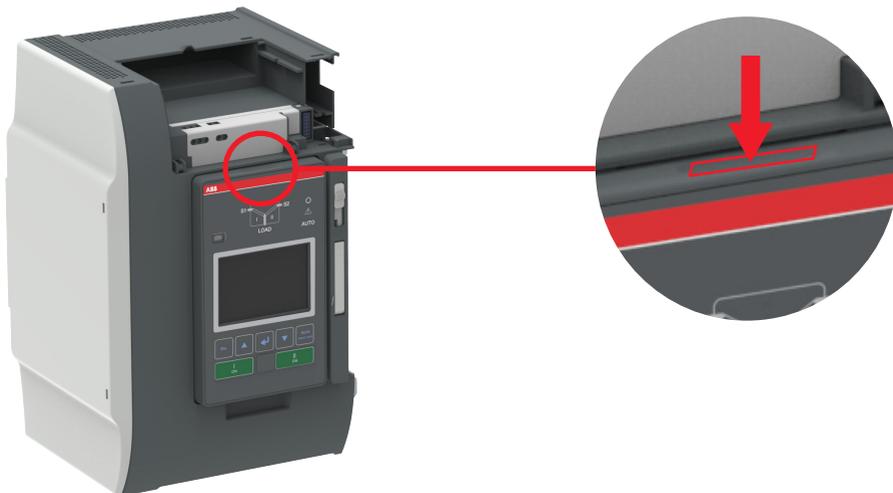


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Tools
Flat screwdriver

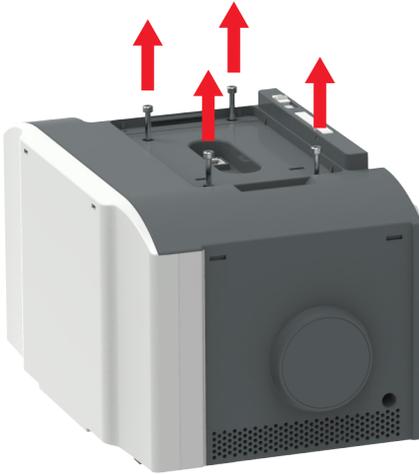


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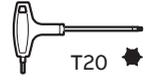
Phase 1 – Disassembly of the controller module**1****2**

3



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Tools

Torx key (size 20)



T20 ★

4



—
Tools

Flat screwdriver



5



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Tools

Flat screwdriver



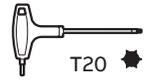
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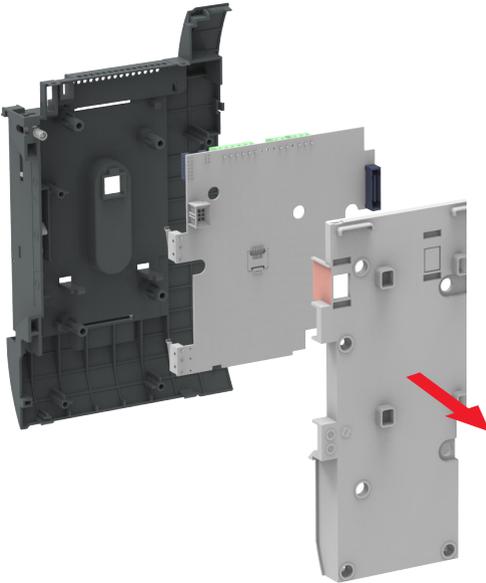
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Tools
Torx key (size 20)

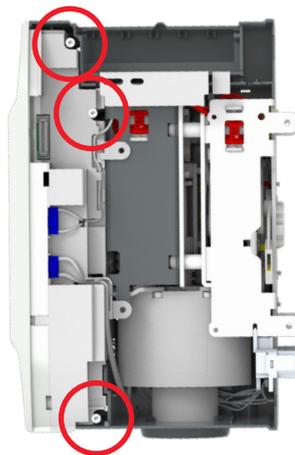


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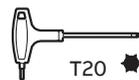
Phase 2 – Disassembly of the power module

1

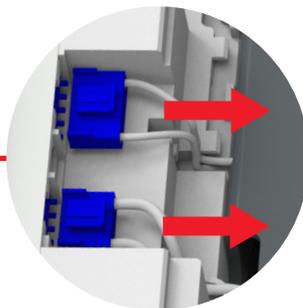
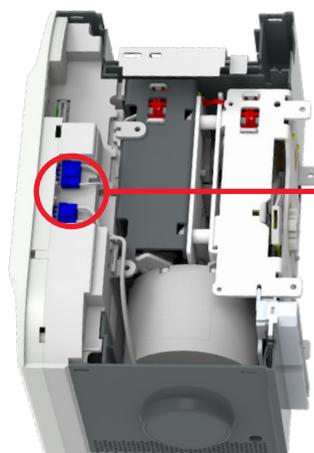


Tools

Torx key (size 20)



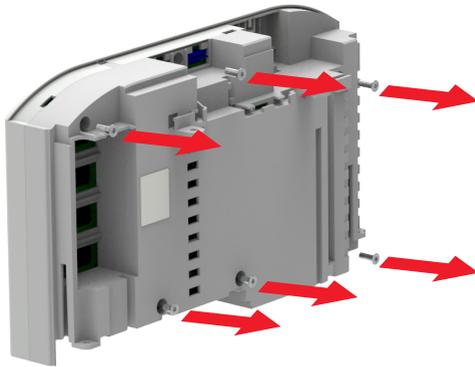
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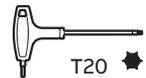


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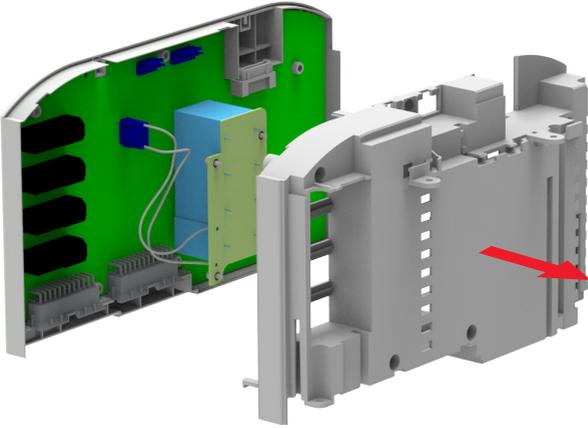


Tools

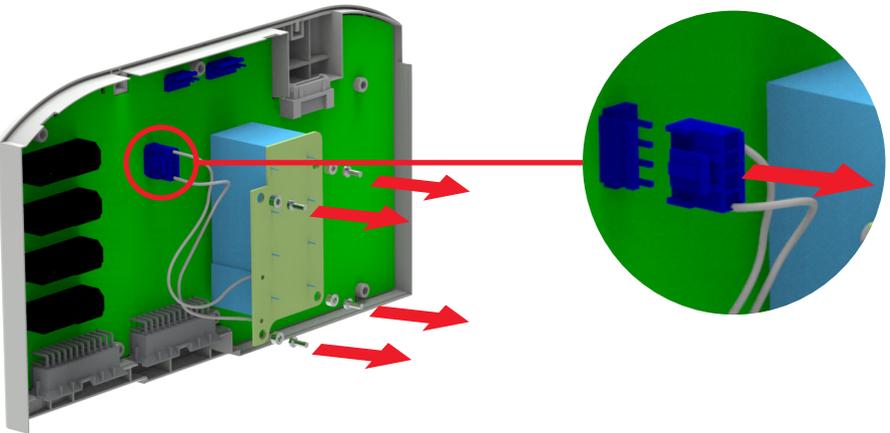
Torx key (size 20)



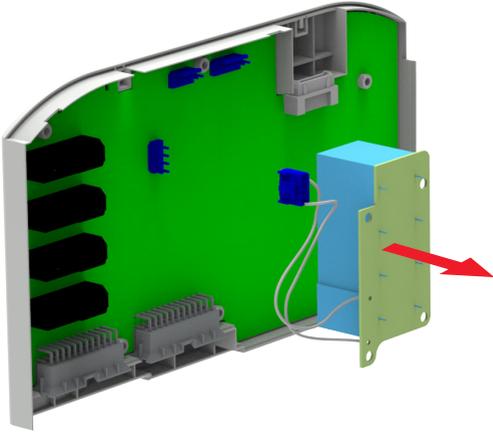
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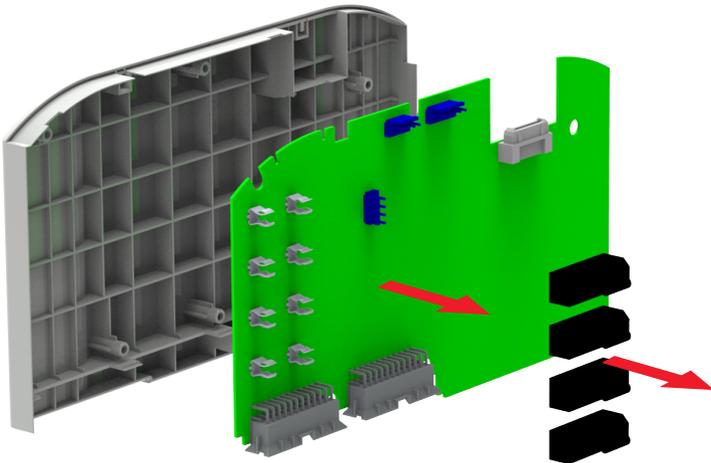
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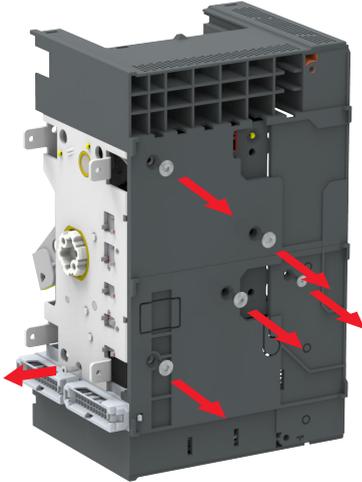


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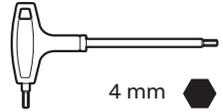
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Phase 3 – Disassembly of the mechanism**1**

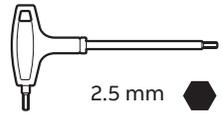
Tools

Allen key (size 4)

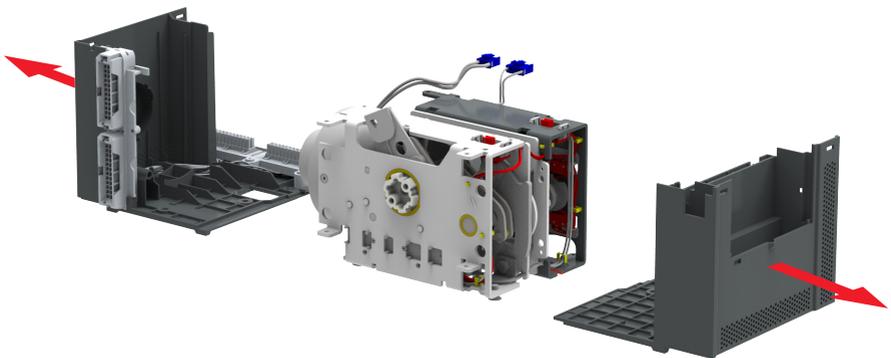


4 mm

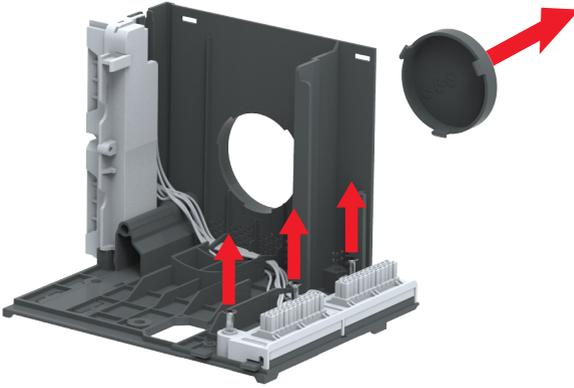
Allen key (size 2.5)



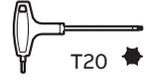
2.5 mm

2

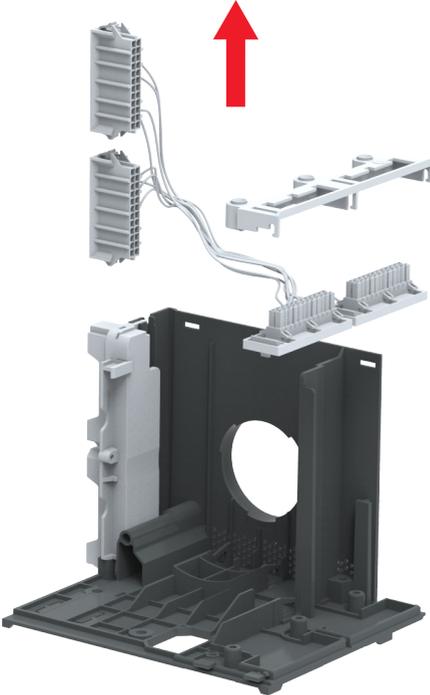
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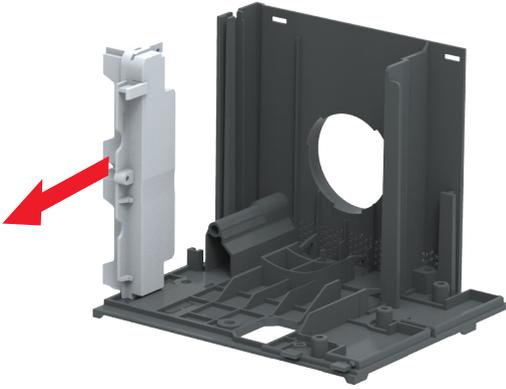
Tools
Torx key (size 20)



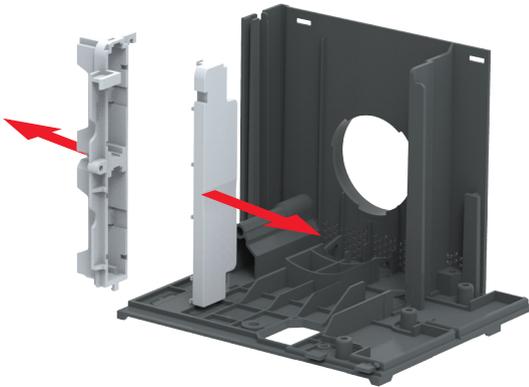
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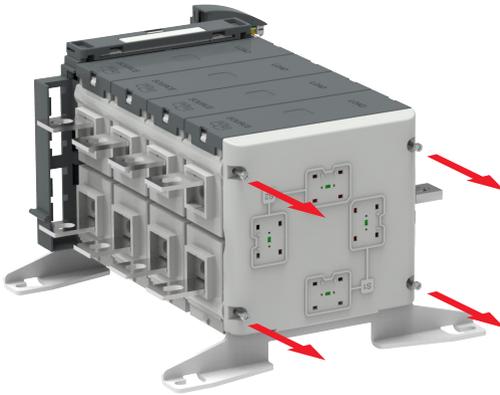


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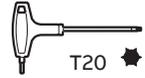
Part II – Disassembly of the poles, position indicator and sensor module

1

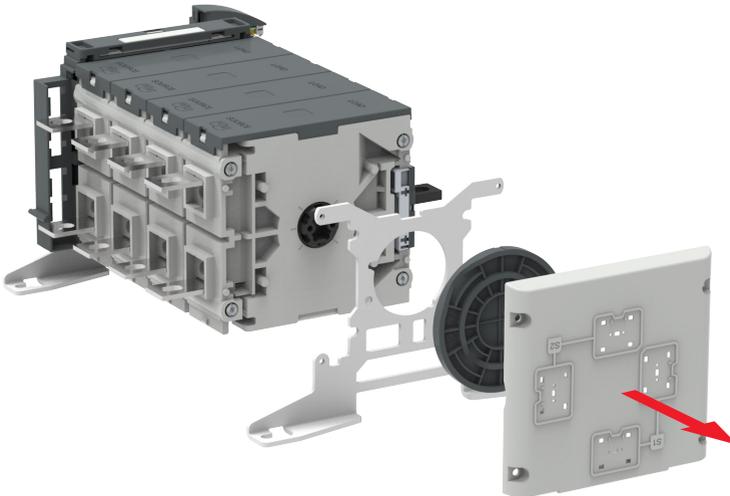


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Tools

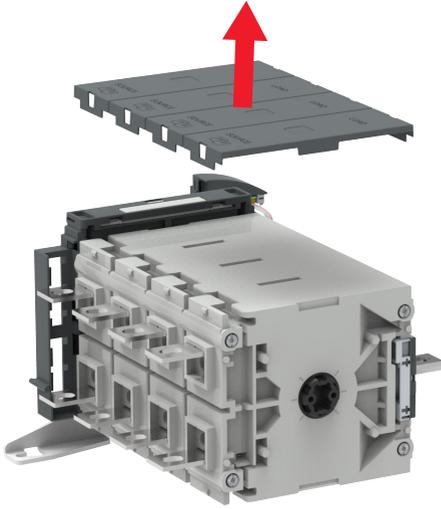
Torx key (size 20)



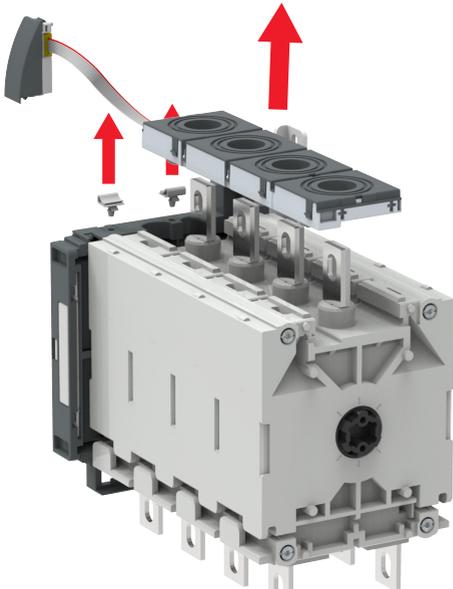
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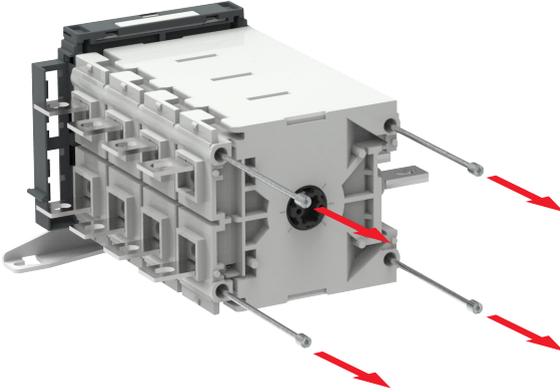
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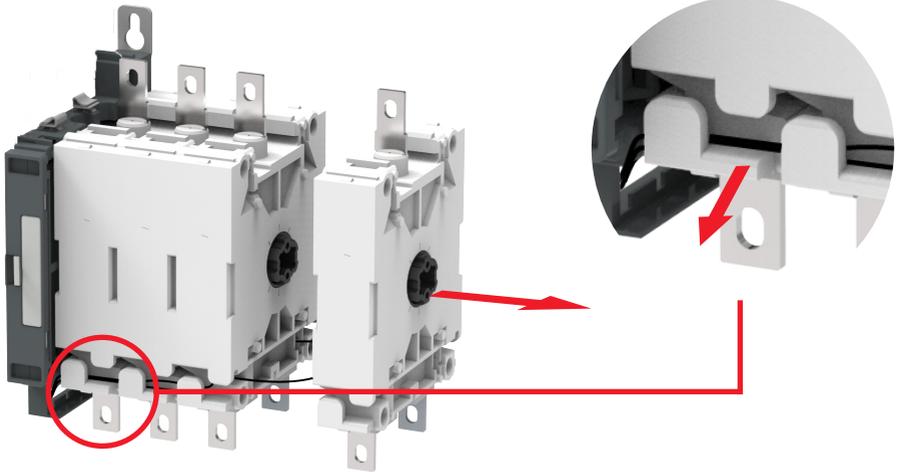


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Tools

Flat screwdriver



6



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Tools

Pliers

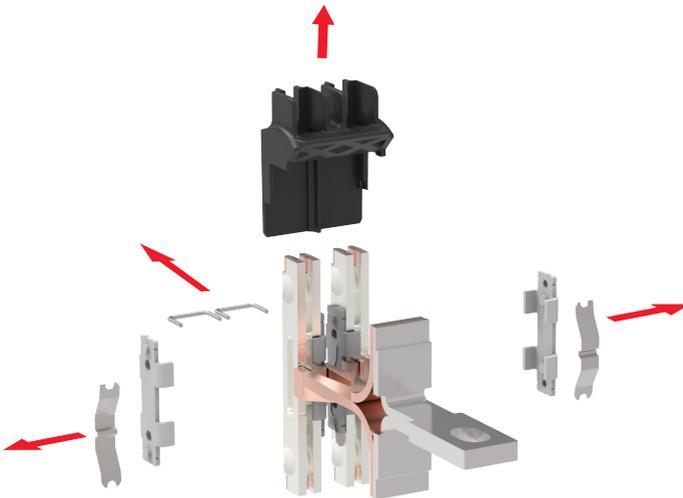


Phase 1 – Disassembly of the poles**1****2**

3

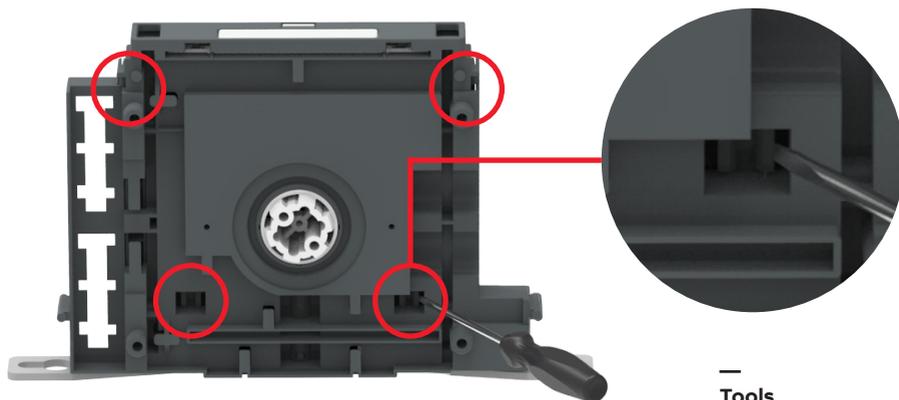


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Phase 2 – Disassembly of the position indicator

1

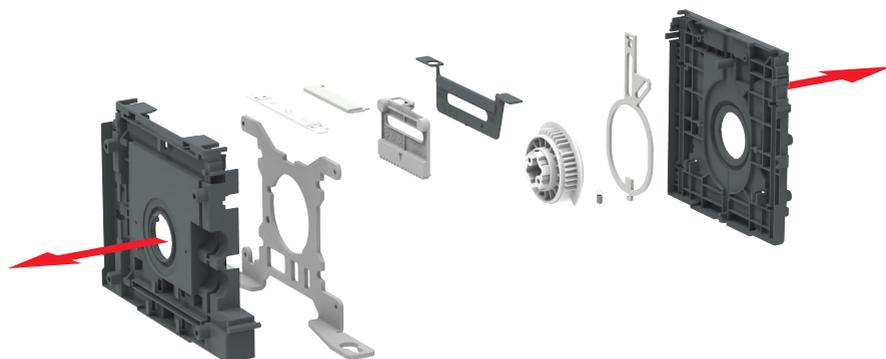


Tools

Flat screwdriver

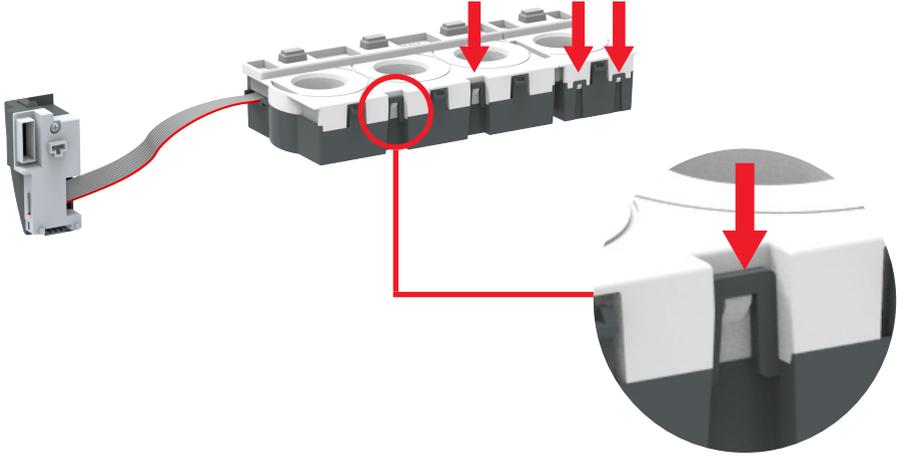


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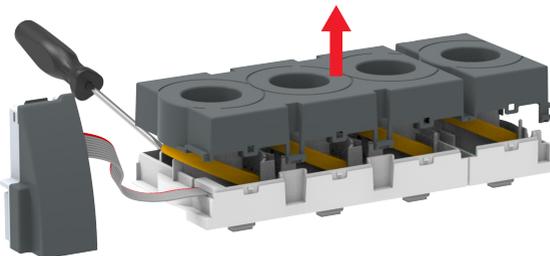
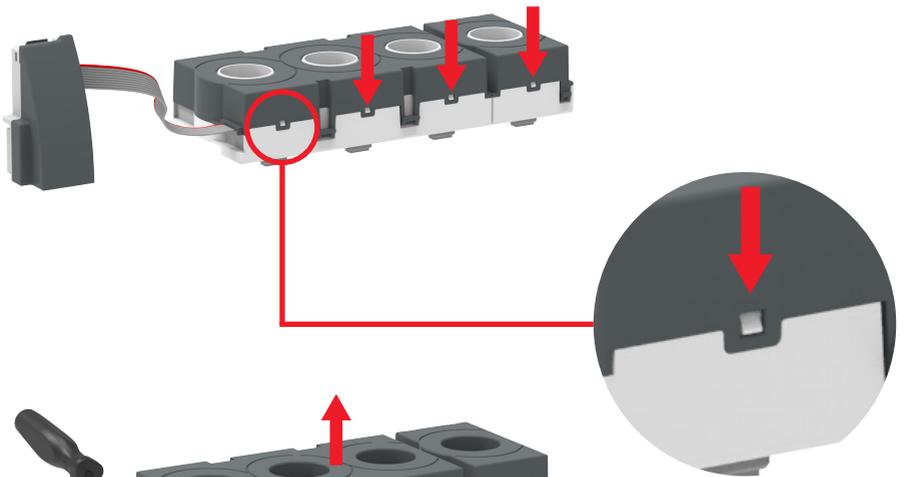


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Phase 3 – Disassembly of the sensor module

1



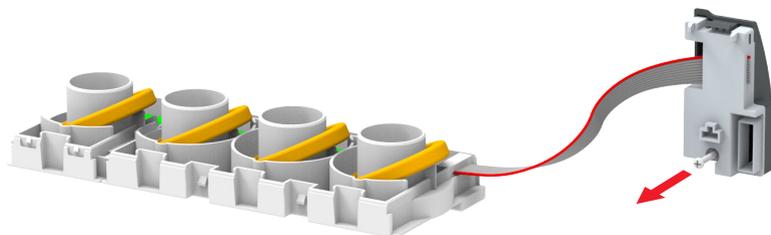
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Tools
Flat screwdriver

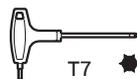


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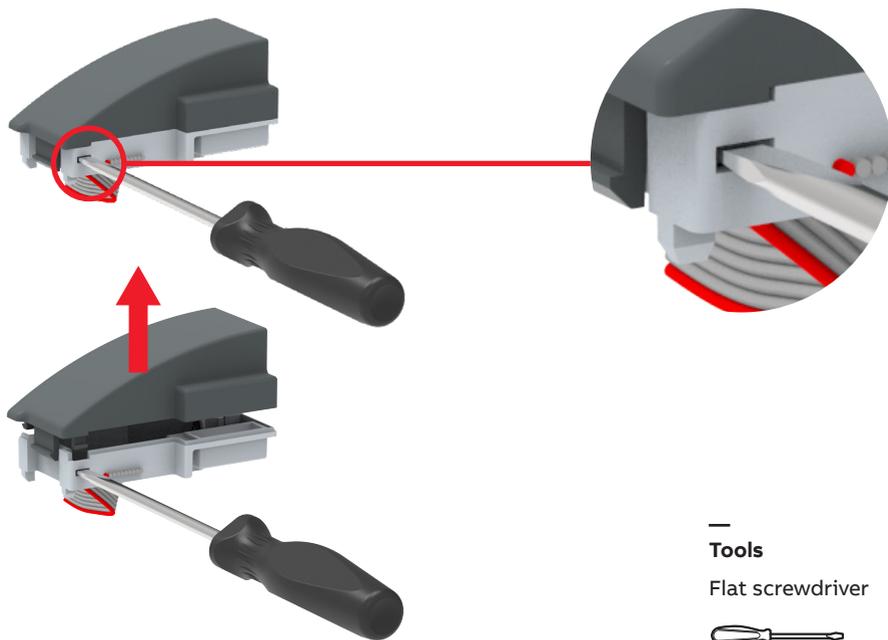


Tools

Torx key (size 7)



4

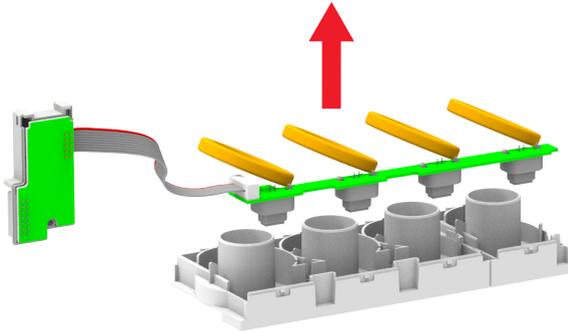


Tools

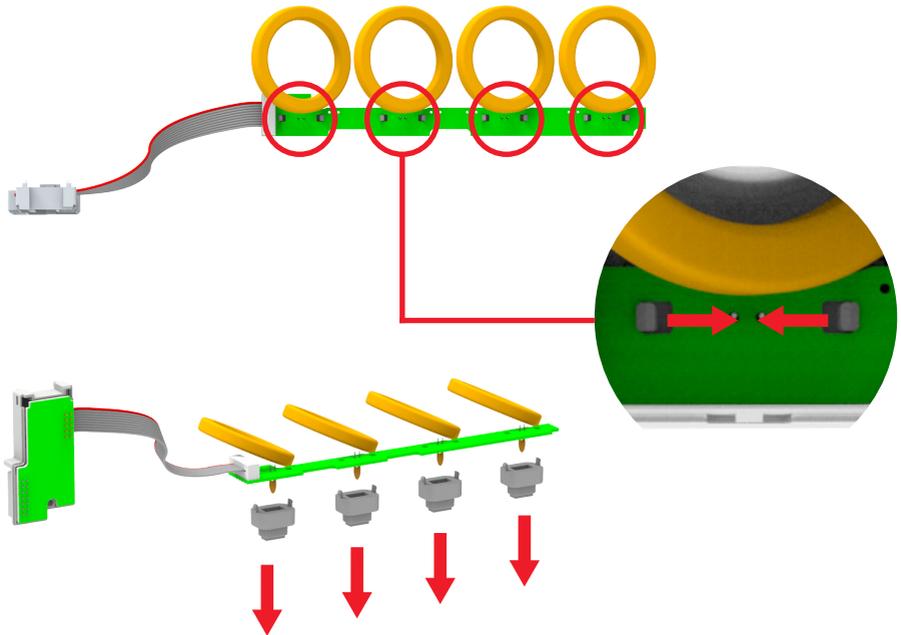
Flat screwdriver



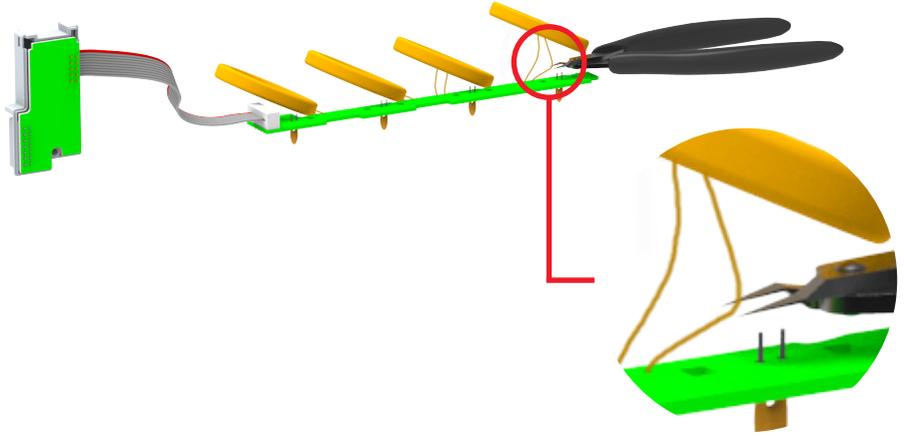
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7



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Tools

Pliers



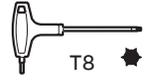
Part III – Disassembly of the HMI

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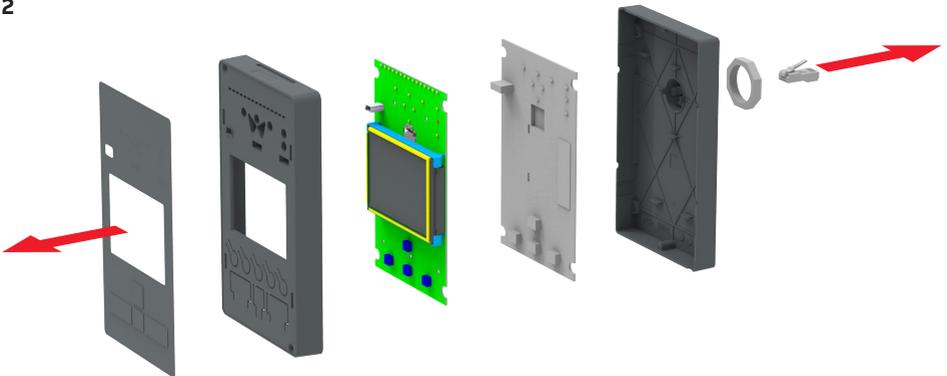


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Tools

Torx key (size 8)



2



Component list

Automatic transfer switch OX_400...1600_

Component name	Quantity	Material(s)	Weight (g/pc)
Mounting plate	2	Steel	580
Support	1	Polycarbonate	55
End cover	1	Polycarbonate	111
Screw	4	Steel	2
Cover for poles	4	Polycarbonate	34-59
Indication Plate	1	Polycarbonate	4
Terminal Cover	1	Polycarbonate	43
Stud screw	2		20
Handle	1	Polycarbonate	45
Shroud	2	Polycarbonate	47
Screw	4		4
Screw	1		1
Phase barriers	1	Polycarbonate	118
Patch cable	1		47
Wire harness	1		26-32
Wire harness	1		23-26
Stud screw	4		40-80

Power module

Component name	Quantity	Material(s)	Weight (g/pc)
Cover	1	Polycarbonate	205
Fuse housing	4	Polyamide	7
Cover	1	Polycarbonate	206
Plastic washer	4	Nylon	0,1
Screw	4	Steel	1
Screw	6	Steel	1
Printed circuit board	1		613
Printed circuit board	1		154

Controller module

Component name	Quantity	Material(s)	Weight (g/pc)
Printed circuit board	1		172
Cover	1	Polycarbonate	109
Controller frame with padlock	1		202
Module frame	1	Polycarbonate	175
Slider	1	Polycarbonate	2
Padlock rod	1	Polycarbonate	1
Spring	1	Steel	1
Padlock module assembly	1	Plastic, metal	22
Screw	1	Steel	1
Screw	4	Steel	1

Sensor module

Component name	Quantity	Material(s)	Weight (g/pc)
Frame A	1	Polyamide	60-107
Frame A	1	Polyamide	22-40
Frame B	1	Polyamide	39-91
Frame B	1	Polyamide	13-31
Sensor interface cover	1	Polycarbonate	6
Sensor interface cover	1	Polycarbonate	5
Screw	1	Steel	1
Thermally conductive gap filler	4		1
Coil	4	Copper	10-29
Printed circuit boards + flat cable	1		39-52

Mechanism

Component name	Quantity	Material(s)	Weight (g/pc)
Mechanism without frames assembly	1		6930-8000
Base cover	1	Polycarbonate	322
Base cover with voltage wire harness	1		343
Base cover	1	Polycarbonate	222
Slide connector	1	Polycarbonate	22
Connector support	1	Polycarbonate	14
Wiring harness	2		100
Door	1	Polycarbonate	9
Voltage connector cover	1	Polycarbonate	9
Screw	3	Steel	1
Screw	1	Steel	1
Screw	4	Steel	3
Screw	1	Steel	1

Pole

Component name	Quantity	Material(s)	Weight (g/pc)
Frame A	1	Glass fiber filled polyester	501-622
Frame B	1	Glass fiber filled polyester	539-676
Arc Plate	10-16	Steel	18-32
Fixed contact	2	Copper	141-950
Roll assembly	1		910-1500
Moving contact assembly	1		368-830
Connection bar	1	Copper	71-245
Copper braid	2-4	Copper	39
Contact knife	2-4	Copper	48
Contact iron	4-8	Steel	15
Contact spring	4-8	Steel	2
Spring guide	2-4	Steel	1
Roll	1	Polyamide	85-138
Locking piece	1	Polyamide	20-33

Position indicator

Component name	Quantity	Material(s)	Weight (g/pc)
Frame A	1	Polycarbonate	193
Frame B	1	Polycarbonate	119
Window	1	Polycarbonate	3
Slider	1	Polyamide	16
Cover	1	Polycarbonate	9
Roll	1	Polyamide	65
Spring	1	Steel	0,4
Lock Plate	1	Steel	53

HMI

Component name	Quantity	Material(s)	Weight (g/pc)
Interface label	1	Protek polyester foil	5
Cover	1	Polycarbonate	49
Printed circuit board	1		79
Cover	1	Polycarbonate	50
Screw	4	Steel	1
Plastic Nut	1		2
Plug adapter	1		3

Recycling information in accordance with the WEEE

The product is marked with the wheelie bin symbol. It indicates that at the end of life the product should enter the recycling system.

You should dispose of it separately at an appropriate collection point and not place it in the normal waste stream.

The figure below shows the wheelie bin symbol indicating separate collection for electrical and electronic equipment (EEE).



The horizontal bar underneath the crossed-out wheelie bin indicates that the equipment has been manufactured after the Directive came into force in 2005.

The wheelie bin symbol is added to the type designation label of the product since 2017.



Contact us

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