Operating Instructions Busch-Jalousiecontrol® II

Busch-Jalousiecontrol® II Flush-mounted inserts 6418 U Basic blind insert





Operating Instructions Busch-Jalousiecontrol® II

1	Safety.	Safety		
2	Intended use			
3	Environment			
4	Setup and function			
	4.1	Modules	4	
	4.2	Overview of devices	5	
	4.3	Features of function and equipment	5	
5	Technic	cal data	5	
6	Installation and electrical connection			
	6.1	Requirements for the electrician	6	
	6.2	Electrical connection	8	
	6.2.1	Motors with mechanical limit switches	8	
	6.2.2	Motors with electronic limit switches	8	
	6.2.3	Use as central unit with cut-off relay or pulse control element	8	
	6.2.4	Test run		
7	Operation			
	7.1.1	Local manual operation	9	
	712	Timer-controlled switching	٥	

1 Safety



Warning

Electric voltage!

Risk of death and fire due to electrical voltage of 230 V.

- Work on the 230V supply system may only be performed by authorised electricians!
- Disconnect the mains power supply prior to installation and/or disassembly!

2 Intended use

The device is to be used exclusively with the components that are supplied and licensed as described in chapter "Setup and function".

3 Environment



Consider the protection of the environment!

Used electric and electronic devices must not be disposed of with domestic waste.

 The device contains valuable raw materials which can be recycled. Therefore, dispose of the device at the appropriate collecting depot.

All packaging materials and devices bear the markings and test seals for proper disposal. Always dispose of the packaging material and electric devices and their components via the authorized collecting depots and disposal companies.

The products meet the legal requirements, in particular the laws governing electronic and electrical devices and the REACH ordinance.

(EU Directive 2002/96/EC WEEE and 2002/95/EC RoHS)

(EU REACH ordinance and law for the implementation of the ordinance (EC) No.1907/2006)

4 Setup and function

The flush-mounted insert described in this manual is used for the control of tubular motors for blinds and roller shutters.

In the following the term "Blind" is also used representatively for other roller shutters.

4.1 Modules

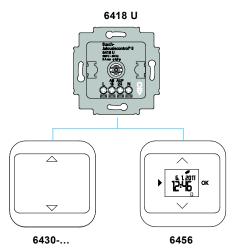


Fig. 1: Flush-mounted inserts with control elements

Two control elements are available for the flush-mounted insert. Different functions are available depending on the control element.

Mechanical control element 6430-...

Local operation:

- Brief press of the button = moving to end position
- · Long press of the button = adjusting

Standard Timer Control Element 6456

Local operation:

Like the mechanical control element plus freely adjustable moving and positioning of the blind.

4.2 Overview of devices

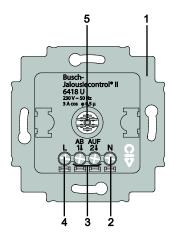


Fig. 2: Device view

Item	Designation			
1	Flush-mounted insert			
2	Connection of neutral conductor			
3	Connection of blind motor			
4	Mains supply			
5	Connection to the control element / terminal tower			

Features of function and equipment 4.3

- Suitable for roller shutter and blind drives with mechanical or electronic limit switch shut-off.
- Suitable for operation without neutral conductor
- Without extension unit input
- Running time: 3 minutes
- N-conductor connection required for operation with control element with glow lamp. N-conductor connection may be required for operation with roller shutter and blind drives with electronic limit switch shut-off. If no N-conductor is available, capacitor set 6498 can be used.

5 Technical data

Designation	Value
Nominal voltage	230 V AC ± 10%, 50 Hz
Maximum switching current:	3 A (cos φ 0.5)
Nominal power	690 VA
Power consumption	< 1 W
Relay operating time	3 minutes
Relay switchover pause	500 ms
Protection type	IP 20
Ambient temperature	035 °C

6 Installation and electrical connection



Warning

Electric voltage!

Risk of death due to electrical voltage of 230 V during short-circuit in the low-voltage line.

Low-voltage and 230 V lines must not be installed together in a flush-mounted socket!

6.1 Requirements for the electrician



Warning

Electric voltage!

Install the device only if you have the necessary electrical engineering knowledge and experience.

- Incorrect installation endangers your life and that of the user of the electrical system.
- Incorrect installation can cause serious damage to property, e.g. due to fire.

The minimum necessary expert knowledge and requirements for the installation are as follows:

- Apply the "five safety rules" (DIN VDE 0105, EN 50110):
 - 1. Disconnect from power;
 - 2. Secure against being re-connected;
 - 3. Ensure there is no voltage;
 - 4. Connect to earth and short-circuit;
 - 5. Cover or barricade adjacent live parts.
- Use suitable personal protective clothing.
- · Use only suitable tools and measuring devices.
- Check the supply network type (TN system, IT system, TT system) to secure the following power supply conditions (classic connection to ground, protective earthing, necessary additional measures, etc.).



Warning

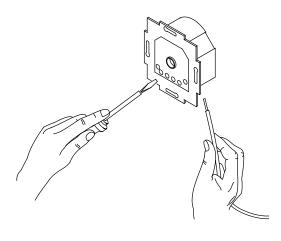
Electric voltage!

Risk of death and fire due to electrical voltage of 230 V.

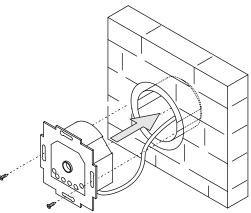
- Work on the 230V supply system may only be performed by authorised electricians!
- Disconnect the mains power supply prior to installation and/or disassembly!

The flush-mounted insert must only be installed in flush-mounted wall boxes according to DIN 49073-1, Part 1, or suitable surface-mounted housings.

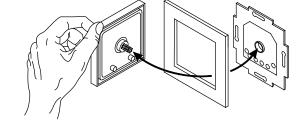
1. Connect the cables to the flush-mounted insert. For the connection assignment see chapter "Electrical connection" on page 8.



2. Mount the flush-mounted-insert.



3. Plug the attachment together with the frame onto the flush-mounted insert. Ensure that the plug-in connection on the rear side does not get jammed. If mounting is difficult, check whether a burr has formed at the lock-in opening of the flushmounted insert and remove it.



The device is now mounted.

4. Actuate the UP and DOWN button while at the same time checking the travel direction of the blind.

6.2 Electrical connection

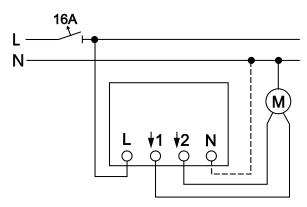


Fig. 3: Circuit diagram

The blind control insert can be used selectively with or without a neutral conductor. The flush-mounted insert is therefore suited for installations where no neutral conductor is available.

6.2.1 Motors with mechanical limit switches

The flush-mounted insert can be used selectively with or without a neutral conductor. When a neutral conductor is available, it should be connected.

6.2.2 Motors with electronic limit switches

$\frac{\circ}{1}$

Note

Some manufacturers of tubular motors exclude their use in combination with a flush-mounted insert. In these cases the neutral conductor must be connected.

- 1. Please adhere to the instructions provided by the manufacturer of the tubular motor concerning commissioning and programming characteristics.
- 2. During connection, ensure that all control lines of the drive are easy to access after the installation, to be able to adjust the end position if necessary.

When using an electric motor with electronic limit switches the flush-mounted insert 6418 U, depending on the type of the motor, may not receive sufficient power supply via the motor. If this is the case, an adequate power supply for the flush-mounted insert 6418 U can be ensured as follows:

- · Connection of the neutral conductor
- · Use of capacitor set 6498

6.2.3 Use as central unit with cut-off relay or pulse control element

If it is used in combination with a cut-off relay, as central unit of a group control system and in combination with an illuminated pulse control element, the neutral conductor must always be connected or the capacitor set 6498 must be installed.

6.2.4 Test run

- 1. Please perform a general functional test after the installation.
- 2. Let the drive run in both directions of travel until it is switched off at the travel limits.

7 Operation

The operation of the blind depends on the control element used. When the control element is attached, the insert recognizes it automatically.

7.1.1 Local manual operation

Button	Function	Actuation / Result
		Brief press of the button:
	Blind UP	- The blind travels to the top or bottom end position.
		- A renewed brief press of the button stops the blind immediately.
V	Blind DOWN	Long button press:
•		- The blind travels up or down as long as the button is pressed.
		- If it is actuated for more than 3 minutes, the flush-mounted insert will be switched off.

7.1.2 Timer-controlled switching

See separate operating manual for control element 6456.

A member of the ABB Group

Busch-Jaeger Elektro GmbH

PO box 58505 Lüdenscheid

Freisenbergstraße 2 58513 Lüdenscheid Germany

www.BUSCH-JAEGER.com

info.bje@de.abb.com

Central sales service:

Phone: +49 (0) 2351 956-1600 Fax: +49 (0) 2351 956-1700

Notice

We reserve the right to at all times make technical changes as well as changes to the contents of this document without prior notice. The detailed specifications agreed to at the time of ordering apply to all orders. ABB accepts no responsibility for possible errors or incompleteness in this document.

We reserve all rights to this document and the topics and illustrations contained therein. The document and its contents, or extracts thereof, must not be reproduced, transmitted or reused by third parties without prior written consent by ABB.

Copyright© 2012 Busch-Jaeger Elektro GmbH All rights reserved

