

Wireless actuator for shading elements and roller shutters FSB61NP-230V



valid for devices from production week 34/09
(see bottom side of housing)

Impulse group switch 1+1 NO contact not potential free 10A/250V AC, for roller blinds and shading systems.

Only 0.9 watt standby loss.

For installation and surface mounting.
45 mm long, 55 mm wide, 33 mm deep.

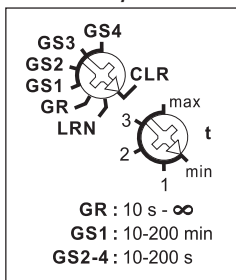
Switching voltage and control voltage local 230V.

This wireless actuator is an impulse group switch and features state-of-the-art hybrid technology that we developed: we combined the wear-free receiver and evaluation electronics and two bistable relays with zero passage switching.

By using a bistable relay coil power loss and heating is avoided even in the on mode. After installation, wait for short automatic synchronisation before the switched consumer is connected to the mains.

In addition to the wireless control input via an internal antenna, this multifunction impulse switch can also be controlled locally by a conventional 230V control switch previously mounted.

Function rotary switches



With the top rotary switch in the setting LRN up to 35 wireless pushbuttons can be assigned therefrom one or more central pushbuttons. The required function of this impulse group switch can then be selected:

GS1 = Group switch with pushbutton control and off delay in **minutes**. Both a wireless pushbutton with the function 'Up-Hold-Down-Hold' as well as the local pushbutton can be taught-in or a wireless pushbutton like a roller Venetian blind double pushbutton with

pressing above 'Up' and pressing below 'Down'. Tap briefly to interrupt the movement immediately.

GS2 = Group switch same as GS1 with off delay in **seconds**.

GS3 = Group switch same as GS1 with off delay in **seconds**. **In addition with double click reversal function** for the local pushbutton and a wireless pushbutton as universal pushbutton which was taught-in accordingly: After double-clicking, the Venetian blind moves in the opposite direction until it is stopped by a brief tap.

GS4 = Group switch same as GS1 with off delay in **seconds**. **In addition with tap changeover function:** The control pushbutton is initially in static mode. The relay is energised as long as the pushbutton is tapped so that the Venetian blind can be reversed in the opposite direction by short impulses. When tapped, the direction switch moves the Venetian blind in the corresponding direction. The universal switches move opposite to the previous direction. If the pushbutton remains closed a little longer, the relay switches over to dynamic mode and the relay remains closed to close or open the Venetian blind, even if the pushbutton is open before the end of the movement. A brief tap interrupts this process immediately.

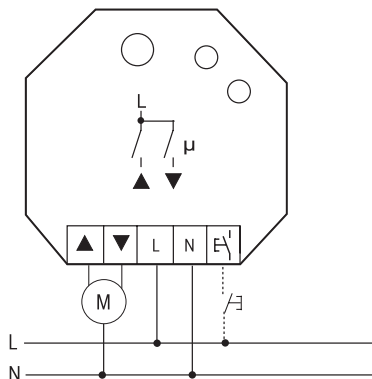
With the bottom rotary switch the off delay can be set in position 'Hold' in minutes (GS1) or seconds. Therefore, the time delay must be chosen at least as long as the shading element or roller shutter will need to move from one limit position to the other.

GR = Group relay. As long as the wireless pushbutton is closed, a contact is closed. Then it reopens. On reception of the next wireless signal the other contact closes, etc. A mandatory pause of 500ms is maintained after a contact change. A local 230V control pushbutton initiates the same function. **Wireless only:** The control signal 'Central Up' closes relay ▲ and 'Central Down' closes relay ▼, as long as the pushbutton is closed. When the bottom rotary switch is in position 'max', no off delay is activated for GR, otherwise the off delay is adjustable from 10 to 200 seconds. The closed contact then opens automatically on expiry of the delay time, even if the pushbutton is not closed.

When a wireless window/door contact FTK or Hoppe window handle is taught-in, a lock-out protection is set up while the door is open and disables a Central Down command.

The LED performs during the teach-in process according to the operation manual. It shows wireless control commands by short flickering during operation.

Typical connection



Technical data

Rated switching capacity each contact	10A/250V AC
Incandescent lamp and halogen lamp load ¹⁾ 230V	2000W
Local control current at 230V control input	3.5mA
Fluorescent lamp load with KVG*	1000 VA in lead-lag circuit or non compensated
Fluorescent lamp load with KVG* and EVG*	500 VA
Compact fluorescent lamps with EVG* 15 x 7 W and energy saving lamps	10 x 20 W
Max. parallel capacitance (approx. length) of local control lead at 230V AC	0.01 μF (30m)
Standby loss (active power)	0.9 W

¹⁾ Applies to lamps of max. 150W.

* EVG = electronic ballast units;
KVG = conventional ballast units

Teaching-in wireless sensors in wireless actuators

All sensors such as wireless pushbuttons, wireless hand-held transmitters, wireless transmitter modules, wireless window/door contacts, wireless timers and wireless motion/brightness sensors must be taught-in in the actuators (receivers with dimmers, switches and relays) so that they can detect and execute commands.

Teaching-in actuator FSB61NP-230V

The teach-in memory is empty on delivery

from the factory. If you are unsure whether the teach-in memory contains something or not, **you must first clear the memory contents completely:**

Set the upper rotary switch to CLR.

The LED flashes at a high rate. Within the next 10 seconds, turn the lower rotary switch three times to the right stop (turn clockwise) and then turn back away from the stop.

The LED stops flashing and goes out after 2 seconds. All taught-in sensors are cleared.

Clear individual taught-in sensors in the same way as in the teach-in procedure, except that you set the upper rotary switch to CLR instead of LRN, and operate the sensor. The LED previously flashing at a high rate goes out.

Teaching-in sensors

- Setting of the lower rotary switch to the desired teaching-in function:
 - Left stop min** = teach-in direction switch top 'UP' and bottom 'DOWN' or 'hold' in both cases;
 - Position 1** = teach-in 'central DOWN';
 - Position 2** = teach-in universal switch 'DOWN-HOLD-UP-HOLD';
 - Position 3** = teach-in 'central UP';
 - Right stop max** = teach-in direction switch top 'UP' and bottom 'DOWN' or 'hold' in both cases;

Direction switches are completely taught-in automatically when operating the top or bottom pushbutton. Otherwise top and bottom must be taught-in in the same way if the top and bottom pushbutton are to have the same function.
 - Set the upper rotary switch to LRN. The LED flashes at a low rate.
 - Operate the sensor which should be taught-in. The LED goes out.
- To teach-in further sensors, turn the upper rotary switch briefly away from position LRN. Continue the procedure from pos 1. After teach-in, set the rotary switches of the actuators to the required function.



When an actuator is ready for teach-in (the LED flashes at a low rate), the very next incoming signal is taught-in. Therefore, make absolutely sure that you do not activate any other sensors during the teach-in phase.

Important reminder!

This electrical equipment may only be installed by skilled electricians otherwise fire hazard or danger of electric shock exists!