

# YESLY Multifunction Electronic Relays



Bathroom lighting control



Bedroom light control



Living room light control



Office lighting control



# Multi and Single function electronic relays with Bluetooth

## 13.22 - Electronic multifunction relay 2 Pole

- Round wall box (ie: Ø 60 mm) mounting
- 21 available functions (step relays, timer, staircase timer) for lighting and fan motor control

## 13.72 - Electronic multifunction relay 2 Pole

- Wall mounting, compatible with most popular Italian residential switch boxes: AVE, BTicino, Gewiss, Simon-Urmet, Vimar
- 21 available functions: step relays, timing (1s - 24h), electric shutter, blind or curtain control

#### 13.S2 - Electronic roller shutter actuator

- Round wall box (ie: Ø 60 mm) mounting
- For electric shutter, blind or curtain control
- 2 contacts NO 6 A 230 V AC independent and programmable channels
- 2 inputs for wired push-buttons (one input per channel)
- Transmission range: approximately 10 m in free space and without obstacles

13.22/13.S2/13.72 Box clamp



NOTE: with 110...125 V AC supply, the Ratings (AC1, AC15 and lamp loads) must be reduced by 50% (e.g. 200 W instead of 100 W)

For outline drawing see page 8



13.22

YESLY



- Offering a variety of ON/OFF functions associated with lighting and fan motor control
- Transmission protocol Bluetooth Low Energy (BLE)
- Safe connection with 128-bit encryption
- App programming with iOS or Android Smartphone:
   Finder YOU
- Can be managed through standard push-buttons, BEYON and Type 013.B9 wireless buttons



YESLY



- Offering a variety of ON/OFF functions associated with lighting, electric shutters, blinds or curtains
- Transmission protocol Bluetooth Low Energy (BLE)
- Safe connection with 128-bit encryption
- App programming with iOS or Android Smartphone:
  Finder YOU
- Can be managed through standard push-buttons, BEYON and Type 013.89 wireless buttons



YESLY



- Suitable for electric shutters, blind or curtain control
- Transmission protocol Bluetooth Low Energy (BLE)
- Safe connection with 128-bit encryption
- App programming with iOS or Android Smartphone:
   Finder YOU
- Can be managed through standard push-buttons, BEYON and Type 013.B9 wireless buttons

For outline drawing see page 8				
Contact specification				
Contact configuration		2 NO (DPST-NO)	2 NO (DPST-NO)	2 NO (DPST-NO)
Rated current/Maximum peak current A		6/40	6/40	6/40
Rated voltage/				
Maximum switching voltage V AC		230/—	230/—	230/—
Rated load AC1	VA	1380	1380	1380
Rated load AC15 (230 V AC)	VA	300	300	300
Single phase motor rating (230)	V AC) W	200	200	200
Nominal lamp rating 230 V:				
incando	escent/halogen W	200	200	_
	cent tubes with			
	lectronic ballast W	200	200	_
	cent tubes with	200	200	
electron	magnetic ballast W	200	200	<u> </u>
	CFL W	200	200	<del>-</del>
	LED 230 V W	200	200	<del>-</del>
-	gen or LED with lectronic ballast W	200	200	_
-	gen or LED with nagnetic ballast W	200	200	_
Supply specification				
Nominal voltage (U <sub>N</sub> )	V AC (50/60 Hz)	110230	110230	110230
Nonina voitage (ON)	V DC		_	_
Rated power AC/DC	VA (50 Hz)/W	2 / 0.5	2 / 0.5	2 / 0.5
Operating range	AC (50 Hz)	(0.81.1)U <sub>N</sub>	(0.81.1)U <sub>N</sub>	(0.81.1)U <sub>N</sub>
	DC	<u> </u>	_	_
Technical data				
Electrical life at rated load in AC1 cycles		60 ⋅ 10³	60 · 10 <sup>3</sup>	60 · 10³
Maximum impulse duration		continuous	continuous	continuous
Dielectric strength between: open contacts VAC		1000	1000	1000
Ambient temperature range °C		-10+50	-10+50	-10+50
Protection category		IP 20	IP 20	IP 20
Approvals (according to type)		<b>(€</b>	C∈ Ek ®	C € FR ®



#### Bluetooth single channel multifunction relay Type 13.21.8.230.B000

- BLE communication protocol
- Round wall box (ie: Ø 60 mm) mounting
- 12 available functions
- Up to 8 scenarios
- Push-button Phase or Neutral connection

13.21 Box clamp





# 13.21.8.230.B000

YESLY



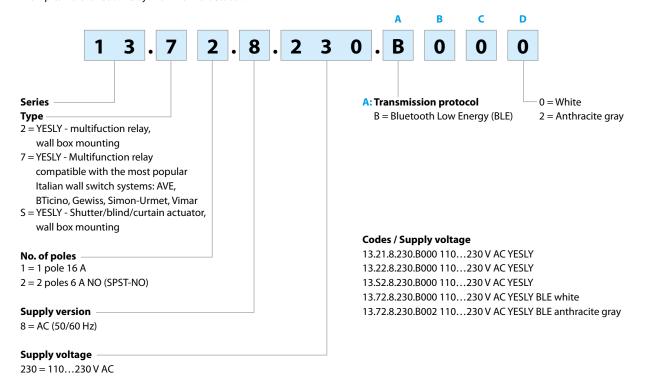
- 1 CO (SPDT) 16 A 250 V AC
- Bluetooth Low Energy (BLE) transmission protocol
- 128-bit encrypted connection
- Programmable via app Finder YOU compatible with iOS and Android operating systems
- It can be connected to wired buttons or to BEYON and 013B9 wireless buttons
- Recess mounting

For outline drawing see page 9

Contact specification				
Contact configuration	1 CO (SPDT)			
Rated current	16			
Rated voltage/				
Maximum switching voltage	V AC	250		
Rated load AC1	VA	3600		
Rated load AC15 (230 V AC)	VA	600		
Single phase motor rating (23	BOVAC) W	500		
Nominal lamp rating 230 V:				
incar	ndescent/halogen W	1000		
fluor				
	electronic ballast W	500		
fluor electr	350			
Ciccu	300			
	200			
LV ha	200			
21 114	200			
LV ha				
electr	500			
Supply specification				
Nominal voltage (U <sub>N</sub> )	V AC (50/60 Hz)	110230		
	V DC	_		
Rated power AC/DC	V A (50 Hz)/W	2.8 / 0.8		
Operating range AC (50 Hz)		(0.81.1)U <sub>N</sub>		
	_			
Technical data				
Electrical life at rated load in A	50 · 10³			
Maximum impulse duration	continuous			
Dielectric strength between:	1000			
Ambient temperature range	-10+50			
Protection category	IP 20			
Approvals (according to type	<b>C</b> €			

#### **Ordering information**

Example: Multifunction relay with YESLY Bluetooth.



#### **Technical data**

Terminals		13.72		13.21	13.21 - 13.22 - 13.52	
Max. wire size		solid cable	stranded cable	solid cable	stranded cable	
	mm²	1 x 6 / 2 x 4	1 x 4 / 2 x 2.5	1 x 2.5 / 2 x 1.5	1 x 2.5 / 2 x 1.5	
	AWG	1 x 10 / 2 x 12	1 x 12 / 2 x 14	1 x 14 / 2 x 16	1 x 14 / 2 x 16	
Screw torque	Nm	0.8		0.5	0.5	
Wire strip length	mm	9		<u>'</u>		
Other data			13.21	13.22	- 13.S2 - 13.72	
Power lost to the environment						
without contact current	W	0.4		0.5		
with rated current	W	W 2.2 1.5		1.5		

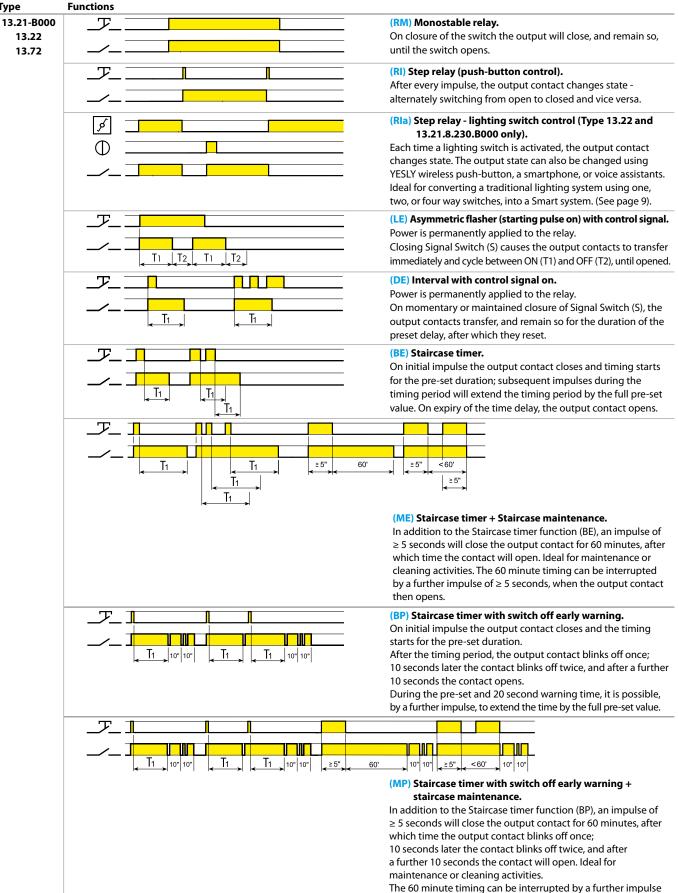
	Reference standard	
contact discharge	EN 61000-4-2	4 kV
air discharge	EN 61000-4-2	8 kV
(803000 MHz)	EN 61000-4-3	10 V/m
on supply terminals	EN 61000-4-4	4 kV
on push-button connection EN 61000-4-4		4 kV
2/50 μs) differential mode	EN 61000-4-5	2 kV
on supply terminals	EN 61000-4-6	10 V
on push-button connection	EN 61000-4-6	10 V
70% U <sub>N</sub> , 40% U <sub>N</sub>	EN 61000-4-11	10 cycles
	EN 61000-4-11	10 cycles
0.1530 MHz	EN 55015 / ETSI EN 301489-1/301489-17	Class B
306000 MHz	ETSI EN 301489-1/301489-17	Class B
	air discharge  (803000 MHz)  on supply terminals  on push-button connection  2/50 µs) differential mode  on supply terminals  on push-button connection  70% U <sub>N</sub> , 40% U <sub>N</sub> 0.1530 MHz	contact discharge EN 61000-4-2 air discharge EN 61000-4-2  (803000 MHz) EN 61000-4-3  on supply terminals EN 61000-4-4  on push-button connection EN 61000-4-5  on supply terminals EN 61000-4-6  on push-button connection EN 61000-4-6  To% U <sub>N</sub> , 40% U <sub>N</sub> EN 61000-4-11  EN 61000-4-11  EN 61000-4-11  EN 55015 / ETSI EN 301489-1/301489-17



#### **Functions**

#### **Relay settings**

Multifunction electronic relays can be configured with the Finder YOU app, available for iOS or Android systems. This product is ready-to-use preset with the factory setting (RI) Step relay on both channels.



of  $\geq$  5 seconds, when the output contact then opens.



## **Functions**

Туре	Functions	
13.21-B000 13.22 13.72		(IT) Timing step relay.  On initial impulse the output contact closes and timing starts.  On expiry of the time delay, the output contact opens.  During the timing period it is possible to immediately open the contact with a further impulse.
	T <sub>1</sub>   10"   10"   T <sub>1</sub>   10"   10"	(IP) Timing step relay with switch off early warning. On initial impulse the output contact closes and timing starts. After the timing period, the output contact blinks off once; 10 seconds later the contact blinks off twice, and after a further 10 seconds the contact opens. During the pre-set and 20 second warning time, it is possible to immediately open the output contact by a further impulse.
	T	(FZ) Timing monostable.  The output will be closed when the switch is closed, except where the switch is closed for greater than the preset time T1 - in which case the output contact opens.
13.22 13.72	P1	(VB) Bathroom light + fan.  Channels Ch1 and Ch2 both close when the P1 command is pressed. At the expiry of T1 Ch1 opens and after a further delay of T2, Ch2 opens.  Ch1 can be prematurely opened by another press of P1.
	P1 $T$ Ch1 $T$ T1  Ch2 $T$ $T$ $T$ $T$ $T$ $T$ $T$ $T$	(CP) Ringbell + light.  A press to P1 closes Ch1 for the pre-set time T1. While Ch1 is closed Ch2 executes a blinking function, at a rate set by T2. Subsequent presses to P1 extends the Ch1 closed time by re-triggering T1.
13.S2 13.72	P1	(TP) Roller shutter.  A short press (<1 second) to P1 ("up" push-button) initiates a 500ms delay before Ch1 closes for time T1. Pressing P1 again within time period T1 will immediately open Ch1 contact. If P1 is closed for more than 1 second the Ch1 contact will open immediately P1 opens.  The same operation applies to P2 and Ch2 contact, used to control the "down" function.

## Sequences

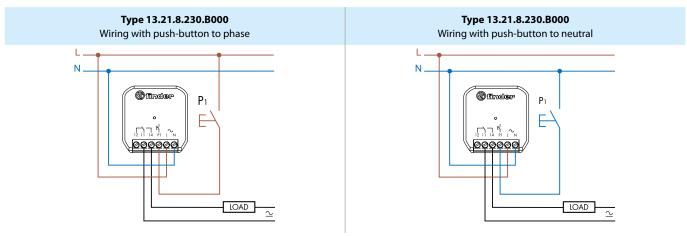
**P1 (SET)**: press to advance through the sequence

P2 (RESET): press to return to Step 1

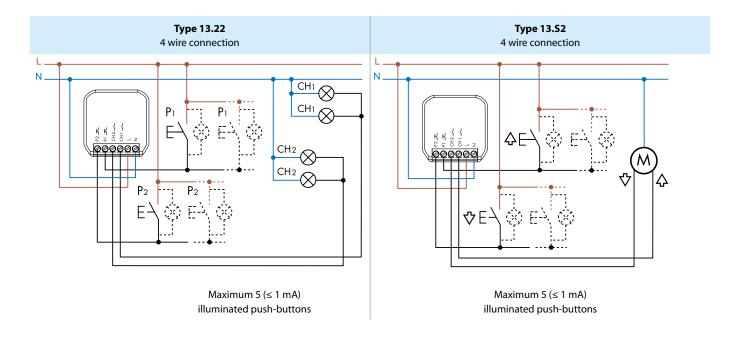
Turns	Functions	Sequences			
Type	runctions	1	2	3	4
13.22 13.72	02	11	<u> </u>		
	03	14			
	04	11	<b> </b>	14	H
	05	11	14	<u> </u>	77
	06	11	14	} }	
	07	11	77	 	
	08	11	<u></u>	11	14



## **Wiring diagrams**



Note: If the load is powered by a phase other than the one that powers the 13.21, a 50% reduction in the lamp capacity must be considered (set the "Different phase" function from the Finder YOU app).



# **Type 13.72** 4 wire connection

Maximum 5 (≤ 1 mA) illuminated push-buttons

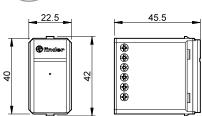


21.9

## **Outline drawings**

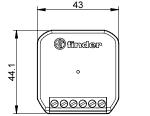
Type 13.72 Box clamp





Types 13.21/13.22/13.S2 Box clamp

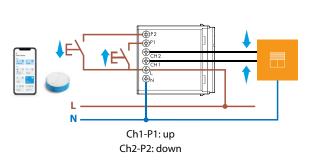


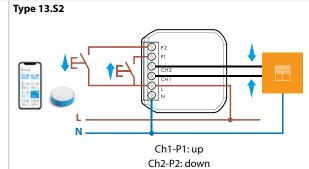


## **Examples of applications**

#### **Function TP - Roller Blinds, Shutters and Curtains**

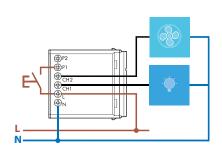
Type 13.72



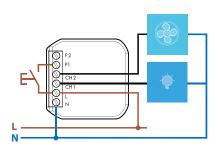


Function VB – Bathroom light + fan

Type 13.72

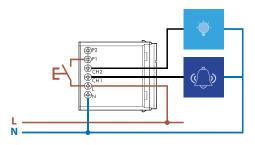




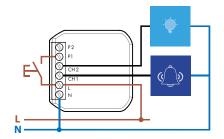


Function CP – Ringbell + Lights

Type 13.72



Type 13.22



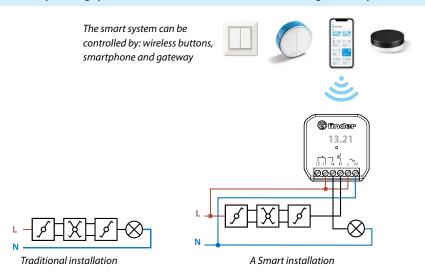


## **Examples of applications**

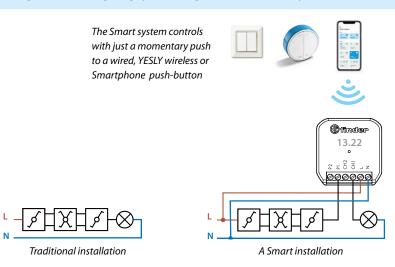
Type 13.21.8.230.B000 - Special function RIa - Step relay (switch control).

Ideal for converting a traditional lighting system using one, two, or four way switches, into a Smart system.

Any existing system can be made Smart with minimum change or disruption



Type 13.22 - Special function RIa - Step relay (switch control). Ideal for converting a traditional lighting system using one, two, or four way switches, into a Smart system.



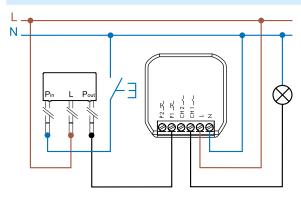


#### **Accessories**



**Push-button phase/neutral converter.** Use this with a pre-existing neutral wired push-button when retro fitting a device designed only for phase connected push-buttons. This avoids any radical change to the existing wiring.

013.00



Application example with type 13.22



013.17

#### **Adapter for DIN rail,** to install devices 13.22, 13.21, 13.S2 in the electrical panel.

013.17

