

Stepping Switch IK 8830



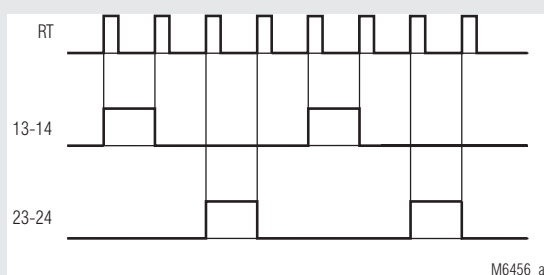
Your Advantages

- Low energy consumption by impulse operation

Features

- According to IEC/EN 60 669
- Impulse operation
- Switching function 1 - 0 - 2 - 0
- Pushbutton for manual actuation of the contacts
- 2 NO contacts
- Width 17.5 mm

Function Diagram



Approvals and Markings



Applications

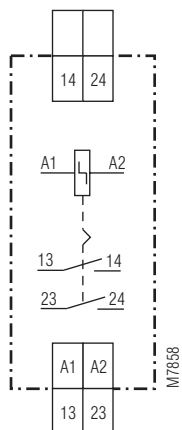
- Switching blind motors to move blinds up and down
- Switching groups of lamps on and off progressively

Function

The blind drive with the switching function 1 - 0 - 2 - 0 is controlled via a pushbutton.

- 1 = Contact 13 - 14 closed
- 2 = Contact 23 - 24 closed

Circuit Diagram



IK 8830.02

Technical Data

Input

Nominal voltage U_N:	AC 24, 230 V (other voltages available on request)
Voltage range:	0.9 ... 1.1 U_N
Nominal consumption:	apparent power 5.2 VA actual power 4.2 W
Nominal frequency:	50 or 60 Hz
Frequency range:	$\pm 5 \%$
Glow lamps parallel to the pushbutton:	max. 8 pieces à 0.5 mA
Max. interference voltage at the inputs:	2.5 kV
Min. switching-on time:	50 ms

Output

Contacts	2 NO contacts
Nominal output voltage:	AC 400 V
Fluorescent lamp load:	20 x 58 W 5 x 10 ⁴ switching cycles (duo switching)
Bulb load:	1500 W, 5 x 10 ⁴ switching cycles
Thermal current I_{th}:	16 A
Switching frequency:	1 000 / h
Short circuit strength	
max. fuse rating:	16 A gG / gL IEC/EN 60 947-5-1
Mechanical life:	3 x 10 ⁶ switching cycles

Connection Terminals

Terminal designation	Signal designation
A1	Control signal L resp. DC+ (via RT - serval local push button)
A2	neutral N resp. DC-
13/14	NO contact 1 LOAD
23/24	NO contact 2 LOAD

Technical Data

General Data

Nominal operating mode: Impulse operation
in case of failure 100 to duty cycle possible

Temperature range

Operation: - 20 ... + 45°C

Storage: - 25 ... + 55°C

Altitude: < 2.000 m

Clearance and creepage distances

rated impulse voltage /
pollution degree: 4 kV / 2 IEC 60 664-1

EMC

Electrostatic discharge: 8 kV (air) IEC/EN 61 000-4-2

HF-Einstrahlung: 80 MHz ... 2.7 GHz: 10 V / m IEC/EN 61 000-4-3

Fast transients: 4 kV IEC/EN 61 000-4-4

Surge voltages
between
wires for power supply: 1 kV IEC/EN 61 000-4-5

between wire and ground: 2 kV IEC/EN 61 000-4-5

HF wire guided: 10 V IEC/EN 61 000-4-6

Interference suppression: Limit value class B EN 55 011

Degree of protection

Housing: IP 30 IEC/EN 60 529

Terminals: IP 20 IEC/EN 60 529

Housing: Thermoplastic with V0 behaviour
according to UL subject 94

Vibration resistance: Amplitude 0.35 mm
frequency 10 ... 55 Hz IEC/EN 60 068-2-6

Climate resistance: Humid heat IEC/EN 60 068-2-30

Terminal designation: EN 50 005

Wire connection: 2 x 2.5 mm² solid or
2 x 1.5 mm² stranded ferruled
DIN 46 228-1/-2/-3/-4
2 x 1 mm² stranded ferruled
DIN 46 228-1/-2/-3/-4

Wire fixing: Terminals with self-lifting
clamping piece IEC/EN 60 999-1

Fixing torque: 0.8 Nm

Mounting: DIN rail IEC/EN 60 715

Weight: 100 g

Dimensions

Width x height x depth: 17.5 x 89 x 58 mm

Standard Type

IK 8830.02 AC 230 V 50 Hz

Article number: 0046625

• Output: 2 NO contacts

• Nominal voltage U_N : AC 230 V

• Width: 17.5 mm

Ordering Example

IK 8830 .02 AC 230V 50Hz

_____ Nominal frequency
_____ Nominal voltage
_____ Contacts
_____ Type

Connection Examples

