



Mono-function and mono-time range

Delayed operation timer	Delayed release timer	Delayed operation and release timer	Fleeting on delay timer
KOP 111	KOP 112	KOP 116	KOP 121
Function diagram 			
Connection diagram 			
Function After application of the voltage the output relay operates with a delay t .	After closing the control contact (terminals 6/7) the output relay operates and releases after control contact opens with delay t . Note: Duration of control pulse min. 20 ms if the control contact is closed during t , then t starts again after contact is opened.	After closing the control contact (terminals 6/7) the output relay operates with delay t and releases after the opening of control contact with the same delay t . Note: Duration of control pulse $> t$. Actuation of the control contact during t cancels the initiated delay time.	After application of the supply voltage the output is in the operating state during time t .
LED status display 	- output in rest position - no timing		- output in rest position - time running

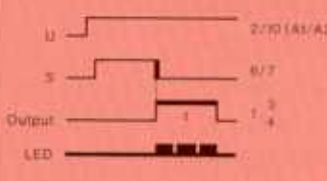
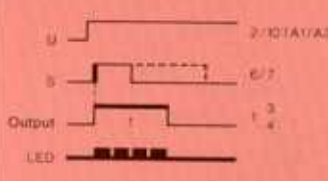
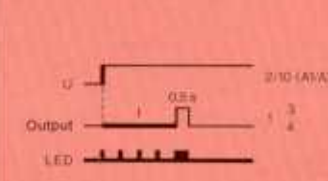
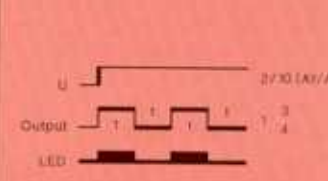
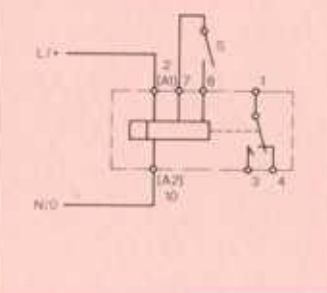
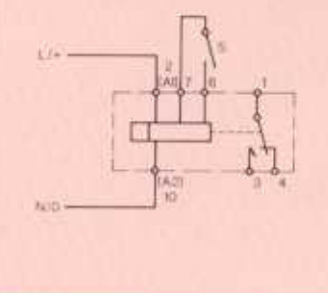
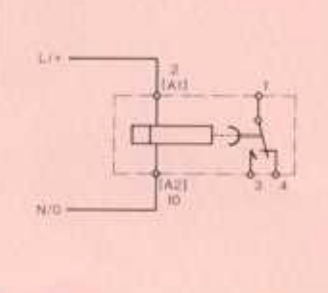
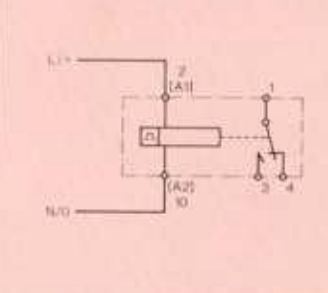
Time ranges and supply voltages: See ordering details, page 15


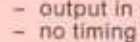
See pages 16/17 for further technical details


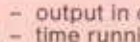
KOP.B

Mono-function and mono-time range

- Plug-in facility to 11-pole plug-in base according to IEC 67-1-18a.
- Output with one changeover contact.
- Manual time setting (protruding setting knob) or using a screwdriver (recessed setting knob).

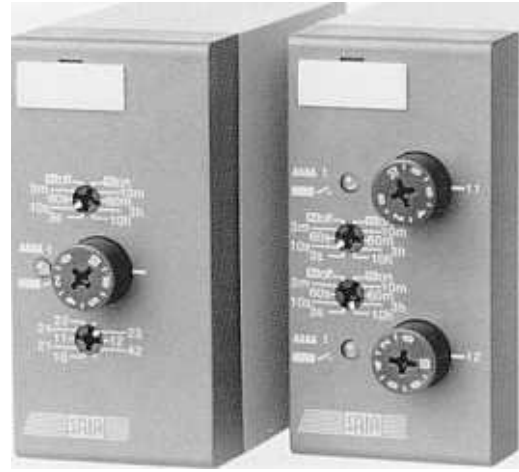
	Fleeting off delay timer	Pulse converter	Pulse generator	Flasher relay
KOP 122	KOP 123	KOP 124	KOP 142	
				
				
<p>After the opening of the control contact (terminals 6/7) the output is in the operating state during the time t.</p> <p>Note: Duration of control pulse min. 20 ms. Closing the control contact during t will interrupt the timing period and the output will revert to the rest state.</p>	<p>After closing the control contact (terminals 6/7) the output is in the operating state during the time t. The time t is independent on the length of the control pulse.</p> <p>Note: Duration of control pulse min. 20 ms. Actuations of the control contact during t are disregarded. No new cycle can be started until after the expiry of t.</p>	<p>After application of the supply voltage the output relay operates with delay t for the fixed pulse duration of 0.5 s.</p>	<p>After application of the supply voltage the output is in the operating state for the time t (starting with a pulse) and is subsequently in the rest state for the same time t. Further periods follow until the supply voltage is removed.</p>	

 - output in operating position
 - no timing

 - output in operating position
 - time running

Multi(8)function and multi(8)time range

Multi(4)function and multi(2 × 8)time range



Universal timer	Impulser	Programming relay	Star-delta relay
KOP 260	KOP 270		KOP 251
<p>Function diagram</p> <p>The 8 functions of the KOP 111 to KOP 142 and 8 time ranges are combined in this universal timer and can be selected from the front using a screwdriver.</p> <p>See KOP 111 to KOP 142 diagrams, pages 12/13</p>			
<p>Connection diagram</p> <p>1) Bridge or external potentiometer 470 kΩ, min. 0.25 W (low voltage)</p>			
<p>Function</p> <p>Function descriptions and notes as for the relevant mono-function timer.</p> <p>See KOP 111 to KOP 142, pages 12/13</p> <p>LED status display</p> <p>See KOP 111 to KOP 142, pages 12/13</p>	<p>After application of the supply voltage, output 1 is in the operating state and output 2 in the rest state during time t_1 and then switches over for the time t_2. Further periods follow until the supply voltage is removed.</p> <p>Note: Fit external bridge across terminals 5 and 6.</p>	<p>After closing the control contact (or application of the supply voltage), output 1 is in the operating state and output 2 in the rest state for the time t_1. After the expiry of t_1, output 1 changes to the rest state and output 2 is in the operating state for the time t_2.</p> <p>Note: Duration of the control pulse min. 20 ms.</p> <p>Actuations of the control contact during the time t_1 are disregarded. An actuation during t_2 initiates the start for a new cycle.</p> <p>Fit an external bridge across terminals 6 and 7.</p>	<p>After application of the supply voltage, output Y (terminal 4) operates and then releases after expiry of the time t_1. Then, after t_1, 50 ms, the output Δ terminal 28 switches on and stays on until the supply voltage is removed. The changeover is inherently short-circuit-proof.</p>

See pages 16/17 for further technical data

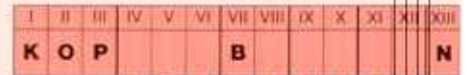
Time ranges and supply voltages: See ordering details, page 15

Multi-function and multi-time range

- Functions and time ranges selectable using a screwdriver.
- The outputs can be brought to the rest or operating states for commissioning by means of the function selector switch.
- Manual time setting (protruding setting knob) or using a screwdriver (recessed setting knob).
- Output with two electrically isolated changeover contacts.
- Plug-in facility to 11-pole plug-in base according to IEC 67-1-18a.

KOP.B

Ordering details



Function (see summary list, pages 12...14)

Time setting knob

- 0** Standard knob (protruding, manual setting)
- 7** Flat knob (recessed, setting with screwdriver)

Time range	KOP111...142	KOP 251	KOP 260/270
0.05... 1 s	BA	—	—
0.15... 3 s	CA	—	MR
0.5 ...10 s	EA	—	MR
1.5 ...30 s	FA	FA	—
3 ...60 s	GA	—	MR
0.15... 3 min	HA	HA	MR
0.5 ...10 min	KA	—	MR
1.5 ...30 min	LA	—	—
3 ...60 min	NA	—	MR
0.15... 3 h	PA	—	MR
0.5 ...10 h	RA	—	MR

Supply voltage (AC: 50/60 Hz)

- BK** 24 V AC/DC
- BR** 36 V AC/DC
- BW** 42 V AC/DC
- CA** 48 V AC/DC
- CD** 60 V AC/DC

- D1** 100-127 VAC
- D8** 150-200 VAC
- E1** 208-250 VAC

Approvals and CSA indicate with the order

Ordering can be by means of the above ASN-code or by description.

Example: Electronic timer KOP 211 B, with standard knob,
0.15...3 s, 24 VDC
or
KOP 211 B0 CA BK N

Accessories (to be ordered separately): Plug-in socket CJ 250

Dimensional drawings

Plug-in socket CJ 250

Snap-on mounting on rail 35 mm, or screw fixing by 2 screws M3.

