



Electronic Time Relay

KZT 110 for single voltage

Function: OFF-delay (RV) without supply voltage

1 time range

Contact equipment: 1 timed changeover

KZT 110



Function

RV (see page K 2/3).

The time setting within a range is carried out with the aid of a thumbwheel disc. Scale values are absolute related to the selected time factor.

Product Description

The electronic time relay KZT 110 is a single range item and is available in the following time ranges:

Time Range

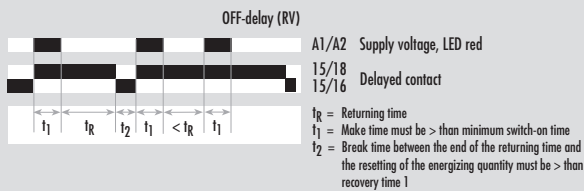
0,05	to	1 s
0,15	to	3 s
0,5	to	10 s
1,5	to	30 s
5	to	100 s

2

Function Diagram

FD 0056

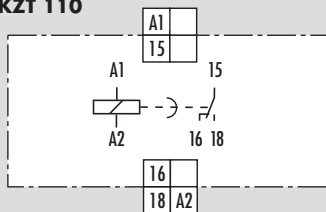
KZT 110



Connection Diagram

KS 0165/2

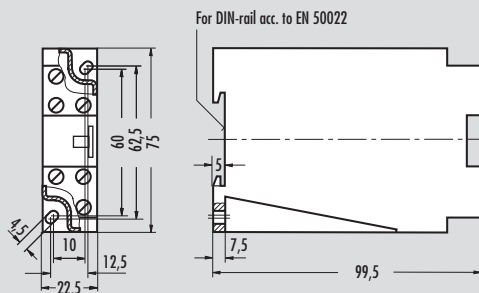
KZT 110



Type	Standard voltage	Special voltage	Price Code
KZT 110 1 s	24 V AC/DC	42 V AC/DC	K 2/43.1
KZT 110 3 s	110 to 120 V AC	48 V AC/DC	
KZT 110 10 s	230 to 240 V AC	60 V AC/DC	
KZT 110 30 s	50 to 60 Hz	50 to 60 Hz	
KZT 110 100 s	24 V AC/DC 110 to 120 V AC 230 to 240 V AC 50 to 60 Hz	42 V AC/DC 48 V AC/DC 60 V AC/DC 50 to 60 Hz	K 2/43.2

Dimensions

K 1-7





TECHNICAL DATA

FUNCTION according to DIN VDE 0435 Part 110:04.89

Point 3.15

Function display
Function diagram

POWER SUPPLY

Rated voltage U_N	V AC/DC
Rated voltage U_N	V AC
Rated consumption at 50 Hz and U_N (AC)	VA
Rated consumption at 50 Hz and U_N (AC)	W
Rated consumption (DC)	W
Starting current inrush	A/ms
Rated frequency	Hz
Operating voltage range	

TIME CIRCUIT

Time setting/Number of time ranges	s
Available time ranges	s
	s
	s
	s
	s
Recovery time 1/2	ms
Minimum switch-ON time	ms
Release value	% U_N
Permissible parallel load	
Internal rectifier	
Average of the error	
Dispersion	% ± 10 ms
Influence of the energizing quantity or supply voltage	%/% ΔU_N
Influence of the ambient temperature	%/K

OUTPUT CIRCUIT

Contact equipment	
Contact material	
Switching voltage U_n	V AC/DC
Maximum continuous current I_n	A
Application category according to EN 60947-5-1:1991	
Permissible switching frequency	switching cycles/h
Mechanical service life	switching cycles
Response time	ms
Release time	ms

GENERAL DATA

Creepage and clearance distances between circuits according to DIN VDE 0110-1:04.97: rated surge voltage	kV
Over voltage category	
Contamination level	
Design voltage	V AC
Test voltage U_{eff} 50 Hz acc. to DIN VDE 0110-1, Table A.1	kV
Protection class housing/terminals acc. to DIN VDE 0470 Sec. 1:11.92	
Radiated noise	
Noise immunity	
Ambient temperature, working range	°C
Dimensions	
Connection diagram	
Weight	kg
Approvals	

GENERAL TECHNICAL SPECIFICATIONS

KZT 110

Electronic time relay for single voltage
OFF-delay time relay without auxiliary supply voltage
1 LED red
FD 0056

	24	42	48	60	110-120	230-240
Rated consumption at 50 Hz and U_N (AC)	0,1	0,2	0,3	0,3	0,8	1,3
Rated consumption at 50 Hz and U_N (AC)	0,06	0,2	0,2	0,2	0,5	0,9
Rated consumption (DC)	0,06	0,4	0,4	0,5		
Starting current inrush	,4/40	,2/40	,2/50	,2/60	,09/40	,05/150
Rated frequency	50 to 60					
Operating voltage range	0,8 to 1,1 x U_N					

Time setting/Number of time ranges	analog/1
Available time ranges	0,05 to 1
	0,15 to 3
	0,5 to 10
	1,5 to 30
	5 to 100
Recovery time 1/2	ca. 250/-
Minimum switch-ON time	200
Release value	-
Permissible parallel load	yes
Internal rectifier	yes
Average of the error	diagram 4, page i.5
Dispersion	$\leq \pm 1$
Influence of the energizing quantity or supply voltage	$\leq 0,04$
Influence of the ambient temperature	$\leq 0,05$

Contact equipment	1 timed changeover
Contact material	Ag-alloy; gold-plated
Switching voltage U_n	230/230
Maximum continuous current I_n	5
Application category according to EN 60947-5-1:1991	AC-15 U_e 230 V AC, I_e 2 A DC-13 U_e 24 V DC, I_e 2 A
Permissible switching frequency	3600
Mechanical service life	10×10^6
Response time	ca. 15
Release time	-

Creepage and clearance distances between circuits according to DIN VDE 0110-1:04.97: rated surge voltage	kV	4
Over voltage category		III
Contamination level		3 outside, 2 inside
Design voltage	V AC	250
Test voltage U_{eff} 50 Hz acc. to DIN VDE 0110-1, Table A.1	kV	2,21
Protection class housing/terminals acc. to DIN VDE 0470 Sec. 1:11.92		IP 30/IP 20
Radiated noise		EN 50081-1:03.93, -2:03.94
Noise immunity		EN 50082-2:1995
Ambient temperature, working range	°C	-20 to + 60
Dimensions		K 1-7
Connection diagram		KS 0165/2
Weight	kg	0,11
Approvals		page i.4

page i.5