



## Multifunction timer relay FMF

The multifunction timer relay FMF is specifically designed for rough industrial environments. All inputs and outputs are both interference free and non-destructive at voltage surges of up to 2 kV. Contact activation may be carried out not only by conventional means such as an isolated contact (between A1 and B1) but also by applying the operating voltage to B1. This helps to reduce wiring and contact requirements of the control and prevents destruction of the devices due to faulty wiring.



**The connection, commissioning and maintenance of the multifunction timer relay must be under the guidance of appropriate personnel. Please note that for the construction and commissioning of electrical equipment relevant prevailing standards.**

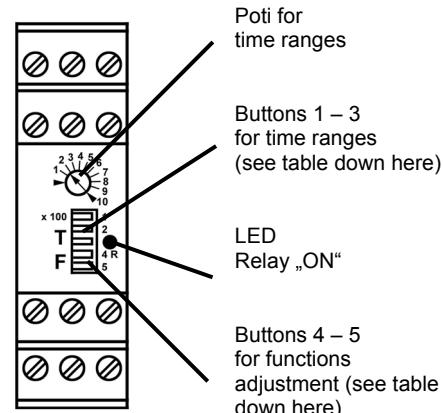
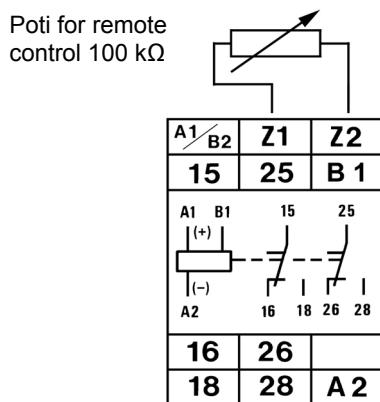
### Adjustable functions:

delay on make, delay on break, on-delay single shot and flashing

#### Remote control:

A remote control can be realised with 2 wires connected to the terminals Z1 / Z2 and a 100 kΩ potentiometer, whereby the FMF potentiometer must be set to 0.

## Circuit Diagram IMF



## Time adjustment

Time ranges		Button position time ranges T		
Initial value	End value	Button 1	Button 2	Button 3
0,05 s	1 s	→	←	→
0,2 s	4 s	→	→	→
1,6 s	32 s	→	→	→
12,5 s	250 s	→	→	→
5 s	100 s	←	→	→
20 s	400s	←	→	→
160 s ( ca. 2,7 min)	3200 s (ca. 53 min)	←	→	→
1250 s ( ca. 21 min)	25000 s (ca. 417 min)	←	←	←

## Functions adjustment

Function	Button position Functions adjustment F		
	Button 4	Button 5	Bridge A1 – B1
Delay on make	→	→	
On-delay single shot	→	→	X
On-delay single shot	→	→	
Flashing	→	→	X
Flashing	→	→	
Delay on break	←	←	

## Technical Data FMF

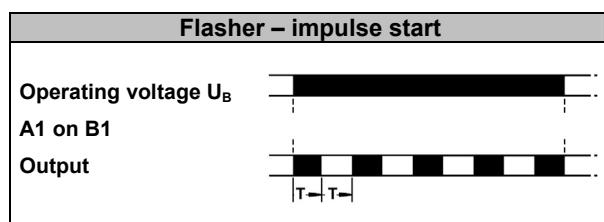
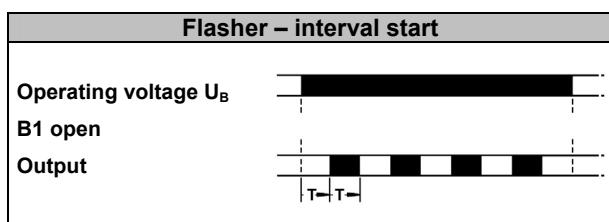
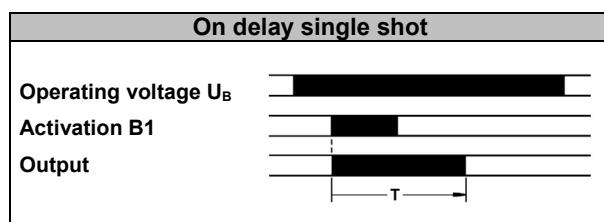
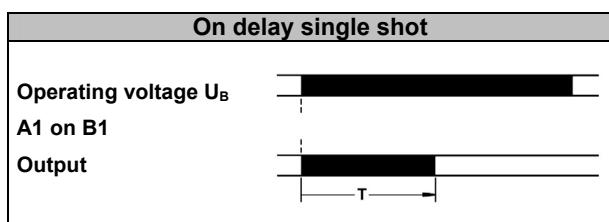
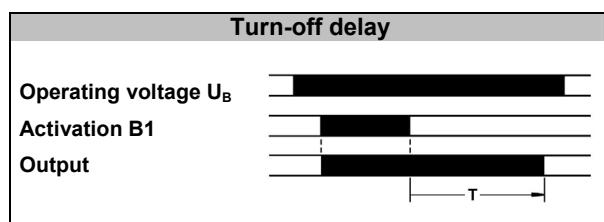
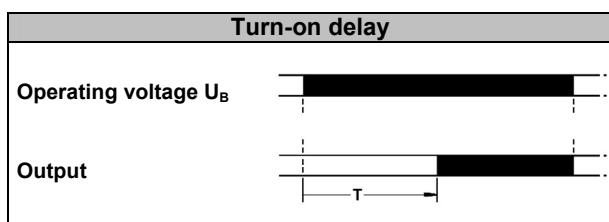
Technical operating data	
Operating voltage $U_B$ (V-AC/DC)	22,5 - 240
Time Stufenlos einstellbar	0,1 s - ca. 7 h
Permissible operating voltage range	± 10%
Operating voltage influence at ± 10% operating voltage fluctuation	< 0,5 %
Duty factor ED	100%
Permissible ambient and media temperature	- 20°C bis +60°C
Permissible ambient humidity rel. humidity, non-condensing	10% bis 90%
Permissible storage temperature	- 40°C bis +80°C
Clearance and creepage distances	VDE 0110

Technical operating data	
Working position	any position
Power consumption	approx. 2 VA
Output contacts	
Series voltage acc. to VDE 0660 and VDE 0110 Group C	250 V-AC
Maximum continuous current 1-change-over, 2-change-over	6 A-AC
Maximum switching capacity per contact	1.500 VA (AC) 50 W (DC)
Mechanical life Cycles	approx. 1 x $10^7$
Electrical life (max. load) Cycles	approx. 2 x $10^5$
Resistance of remote -control Standard	100 kΩ

Enclosure data	
Material	RABS flameproof, UL-approved
Mounting	snap on 35 mm DIN-rail connector acc. to EN 50 035
Enclosure-protection	IP 40
Protection against shock	acc. VBG 4
Terminals	Screw clamps
Cross-section	2 x 1,5 mm <sup>2</sup>
Weight	200 g

General data	
Tolerance range	± 10%
Repeatability	± 0,5 %
Temperature range	ca. 0,2 % / °C
Recovery time	< 100 ms

## Functional Overview FMF



Condor Pressure Control GmbH

Warendorfer Straße 47 – 51  
D-59320 Ennigerloh

Phone: +49 (0) 25 87 / 89 - 0  
Telefax: +49 (0) 25 87 / 89 - 140

info@condor-cpc.com  
www.condor-cpc.com