

IEC Technical data

EK110 – EK1000

Magnet System Characteristics for EK... Contactors - a.c. Operated

Contactor types: EK...		110	150	175	210	370	550	1000	
Rated control circuit voltage U_c									
– at 50 Hz	V	24 ... 500					48 ... 500		
– at 60 Hz	V	24 ... 600					110 ... 600		
Coil operating limits according to IEC 60947-4-1		$\vartheta \leq 70^\circ\text{C}$							
		$0.85 \dots 1.1 \times U_c$							
Drop-out voltage in % of U_c		roughly 45 ... 65 %							
Coil consumption									
Average pull-in value	50 Hz ^① VA	800		1100		3500			
	60 Hz ^① VA	900		1200		4000			
	50/60 Hz ^② VA/VA	500/500		630/630		3800/3400			
Average holding value	50 Hz ^① VA/W	44/15		52/18		125/50			
	60 Hz ^① VA/W	52/18		65/22		140/60			
	50/60 Hz ^② VA/W	2.5/2.5		2.5/2.5		140/60			
Operating time between coil energization and:									
– N.O. contact closing	ms	20 ... 40 ^① / 30 ... 50 ^②					30 ... 60		
– N.C. contact opening	ms	15 ... 35 ^① / 25 ... 45 ^②					25 ... 55		
Operating time between coil de-energization and:									
– N.O. contact opening	ms	7.5 ... 15 ^① / 9.5 ... 120 ^②					10 ... 20		
– N.C. contact closing	ms	10 ... 18 ^① / 100 ... 125 ^②					13 ... 23		

Magnet System Characteristics for EK... Contactors - d.c. Operated

Contactor types: EK...		110	150	175	210	370	550	1000	
Rated control circuit voltage U_c	V d.c.	12 ... 220					24 ... 220		
Coil operating limits according to IEC 60947-4-1		$\vartheta \leq 70^\circ\text{C}$							
		$0.85 \dots 1.1 \times U_c$							
Drop-out voltage in % of U_c		roughly 15 ... 50 %							
Coil consumption - Average values									
– pull-in value	W	500		630		1100			
– holding value	W	2.5		2.5		20			
Coil time constant									
– open	L/R ms	8					12		
– closed	L/R ms	50					60		
Operating time between coil energization and:									
– N.O. contact closing	ms	30 ... 50					60 ... 80		
– N.C. contact opening	ms	27 ... 47					55 ... 75		
Operating time between coil de-energization and:									
– N.O. contact opening	ms	10 ... 35							
– N.C. contact closing	ms	13 ... 38							

^① "A" coil voltage codes see page 1.29.

^② 50/60 Hz "E" coil voltage codes see page 1.29.