EKM1-63 6KA MCB

Mini Circuit Breaker

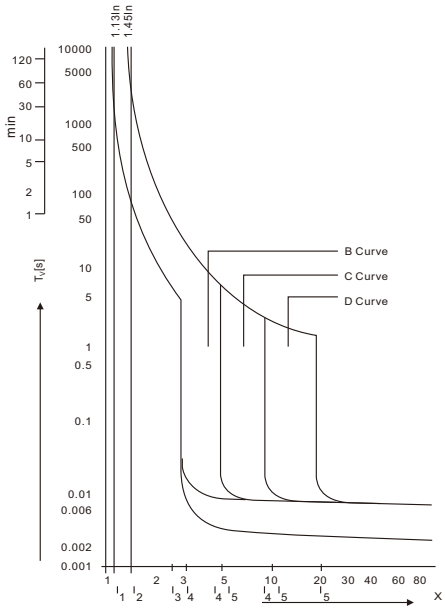
Standard_ IEC60898-1

Technical Data

Electrical Features	Rated current In	1,2,3,4,5,6,8,10,13,16,20,25,32,40,50,63A
	Poles	1P, 1P+N, 2P, 3P, 3P+N,4P
	Rated voltage Ue	240/415V~
	Insulation voltage Ui	500V
	Rated frequency	50/60Hz
	Rated breaking capacity	6,000A
	Energy limiting class	3
	Rated impulse withstand voltage(1.5/50) Uimp	4,000V
	Dielectric test voltage at ind. Freq. for 1 min	2kV
	Pollution degree	2
	Thermo-magnetic release characteristic	B,C,D
Mechanical Features	Electrical life	8,000 Cycles
	Mechanical life	20,000 Cycles
	Contact position indicator	Yes
	Protection degree	IP20
	Reference temperature for setting of thermal element	30°C
	Ambient temperature (with daily average≤35°C)	-5°C~+40°C
	Storage temperature	-25°C~+70°C
Installation	Terminal connection type	Cable/Pin-type busbar/U-type busbar
	Terminal size top/bottom for cable	25mm² 18-3AWG
	Terminal size top/bottom for busbar	25mm² 18-3AWG
	Tightening torque	2.5Nm 22In-lbs
	Mounting	On DIN rail EN60715(35mm) by means of fast clip device
	Connection	From top and bottom
Combination with accessories	Auxiliary contact	EKM1-OF
	Alarm contact	EKM1-FB
	Shunt release	EKM1-MX
	Over/Under voltage release	EKM1-MV+MN

MCB Characteristics

Characteristics Curves

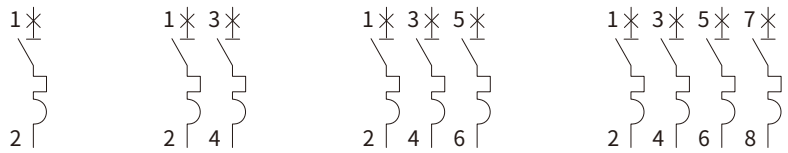


Thermal Tripping				Magnetic Tripping		
As per IEC60898	No tripping current	Tripping current I_2	Time Limits t	Hold current I_4	Trip current I_5	Time Limits t
B Curve	$1.13\times I_N$	$1.45\times I_N$	⩾1h <1h	$3\times I_N$	$5\times I_N$	⩾0.1s <0.1s
C Curve	$1.13\times I_N$	$1.45\times I_N$	⩾1h <1h	$5\times I_N$	$10\times I_N$	⩾0.1s <0.1s
D Curve	$1.13\times I_N$	$1.45\times I_N$	⩾1h <1h	$10\times I_N$	$20\times I_N$	⩾0.1s <0.1s

Tripping characteristics

Based on the Tripping Characteristics, MCB are available in “B”, “C” and “D” curve to suit different types of applications.
“B” Curve for protection of electrical circuits with equipment that does not cause surge current (lighting and distribution circuits) Short circuit release is set to (3-5)In.
“C” Curve for protection of electrical circuits with equipment that cause surge current (inductive loads and motor circuits) Short circuit release is set to (5-10)In.
“D” Curve for protection of electrical circuits with cause high inrush current ,typically 12-15 times the thermal rated current (transformes, x-ray machines etc,)Short circuit release is set to (10-20)In.

Circuit Diagram



Overall and Installation Dimension(mm)