

HCMS-32S Motor Circuit Breaker Specifications

Product Features:

- Overload, underphase and high breaking protection;
- Short-circuit electromagnetic tripping value 13 times I_e ;
- Thermodynamic adjustable tripping, Class10 tripping grade;
- Excellent performance, space-saving, can be a perfect replacement for circuit breaker
- Phase-loss protection flow protection
- The rated current is adjustable
- Ambient temperature compensation



Approvals/Standards:

IEC 60947-1,60947-2,60947-4-1

EN 60947-1,60947-2,60947-4-1

UL 60947-4-1

Product Model:

HC	MS	- 32	S	- 010	
Company Code					
Motor circuit breaker					
Frame Current : 32					
S:	Standard				
Rated Current	P16: 0.1~0.16A 1P6:1~1.6A 010:6.3~10A 032:24~32A	P25:0.16~0.25A 2P5:1.6~2.5A 013:9~13A	P4:0.25~0.4A 004:2.5~4A 016:11~16A	P63:0.4~0.63A 006:4~6A 020:14~20A	001:0.63~1A 008:5~8A 025:19~25A

accessories : Auxiliary contact, Shunt release, Undervoltage release

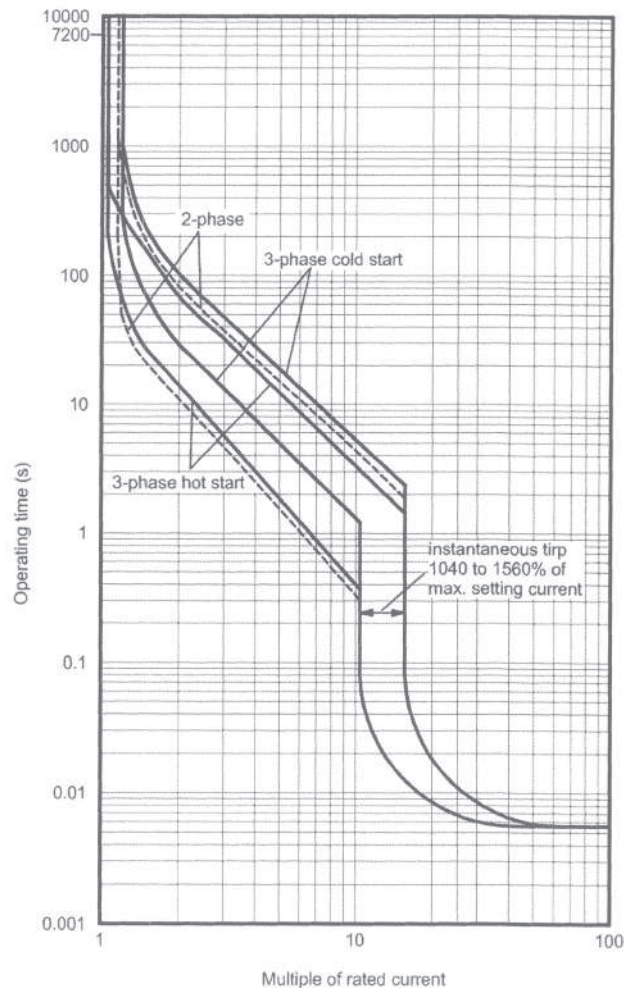
Product Horsepower

According to the standard	Rated Current (A)	Current Class	Single phase		Single phase		
			110-120V	220-240V	220-240V	440-480V	550-600V
UL 60947-4-1	0.16	0.1-0.16A	-	-	-	-	-
	0.25	0.16-0.25A	-	-	-	-	-
	0.4	0.25-0.4A	-	-	-	-	-
	0.63	0.4-0.63A	-	-	-	-	-
	1	0.63-1.0A	-	-	-	-	1/2
	1.6	1.0-1.6A	-	1/10	-	3/4	3/4
	2.5	1.6-2.5A	-	1/6	1/2	1	5 1/2
	4	2.5-4A	1/8	1/3	3/4	2	3
	6	4-6A	1/4	1/2	1 1/2	3	5
	8	5-8A	1/3	1	2	5	5
	10	6.3-10A	1/2	1 1/2	3	5	7 1/2
	13	9-13A	1/2	2	3	7 1/2	10
	16	11-16A	1	2	5	10	10
	20	14-20A	1 1/2	3	5	10	15
	25	19-25A	2	-	7 1/2	15	20
32	24-32A	2	5	10	20	30	

Technical parameters

Model	HCMS-32S
Rated Current	P16: 0.1~0.16A P25: 0.16~0.25A P4: 0.25~0.4A P63: 0.4~0.63A 001: 0.63~1A 1P6: 1~1.6A 2P5: 1.6~2.5A 004: 2.5~4A 006: 4~6A 008: 5~8A 010: 6.3~10A 013: 9~13A 016: 11~16A 020: 14~20A 025: 19~25A 032: 24~32A
Rated Operational Voltage	1000VAC
Rated insulation voltage	1000VAC
Trip grade	10(UL60947 -4-1)/10A(IEC)
Operating Frequency	50/60Hz
Temperature Compensation	YES
Phase failure protection	YES
Protection class	IP20
Mechanical life	100,000
Electrical life	100,000
Operation frequency	40op/h
Allowable operating ambient temperature	-25~+60°C
Allowable storage ambient temperature	-40~+80°C
Allowable altitude (m)	3000
Rated impulse withstand voltage	6kV
Product certification	UL/CE

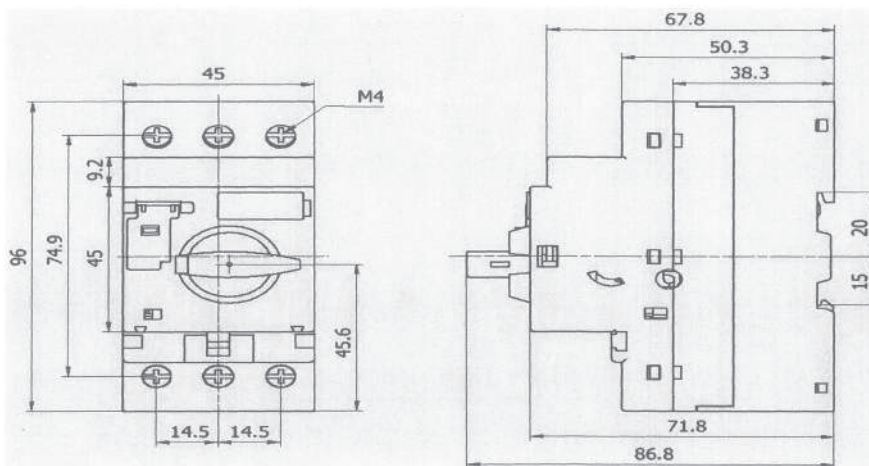
Action characteristic curve (HCMS-32S)



Start-off Capacity

According to the standard	Rated Current (A)	Current Class	Short-circuit protection capacity (kA)					
			220~240V		380~415V		600~690V	
			I _{cu}	I _{cs}	I _{cu}	I _{cs}	I _{cu}	I _{cs}
IEC 60947-2 GB14048.2 EN60947-2	0.16	0.1-0.16A	100	100	100	100	100	100
	0.25	0.16-0.25A	100	100	100	100	100	100
	0.4	0.25-0.4A	100	100	100	100	100	100
	0.63	0.4-0.63A	100	100	100	100	100	100
	1	0.63-1.0A	100	100	100	100	100	100
	1.6	1.0-1.6A	100	100	100	100	100	100
	2.5	1.6-2.5A	100	100	100	100	3	3
	4	2.5-4A	100	100	100	100	3	3
	6	4-6A	100	100	100	100	3	3
	8	5-8A	100	100	100	100	3	3
	10	6.3-10A	100	100	50	38	3	3
	13	9-13A	100	100	50	38	3	3
	16	11-16A	100	100	25	19	3	3
	20	14-20A	50	50	25	19	3	3
	25	19-25A	50	50	25	19	3	3
32	24-32A	50	50	25	19	3	3	
According to the standard	Rated Current (A)	Current Class	Short-circuit protection capacity (kA)					
			240V	480Y/277V	600Y/347V			
			I _{cu}	I _{cs}	I _{cu}			
UL 60947-4-1	0.16	0.1-0.16A	100	100	100			
	0.25	0.16-0.25A	100	100	100			
	0.4	0.25-0.4A	100	100	100			
	0.63	0.4-0.63A	100	100	100			
	1	0.63-1.0A	100	100	100			
	1.6	1.0-1.6A	100	100	100			
	2.5	1.6-2.5A	100	100	5			
	4	2.5-4A	100	50	5			
	6	4-6A	100	50	5			
	8	5-8A	100	15	5			
	10	6.3-10A	100	15	5			
	13	9-13A	100	15	5			
	16	11-16A	100	15	5			
	20	14-20A	50	10	5			
	25	19-25A	50	8	5			
32	24-32A	40	8	5				

Mounting dimension (HCMS-32S)



HCMS-63S Motor Circuit Breaker Specifications

Product Features:

- Overload, underphase and high breaking protection;
- Short-circuit electromagnetic tripping value 13 times I_e ;
- Thermodynamic adjustable tripping, Class10 tripping grade;
- Excellent performance, space-saving, can be a perfect replacement for circuit breaker
- Phase-loss protection flow protection
- The rated current is adjustable
- Ambient temperature compensation



Approvals/Standards:

IEC 60947-1,60947-2,60947-4-1

EN 60947-1,60947-2,60947-4-1

UL 60947-4-1

Product Model:

	HC	MS	- 63	S	- 063	
Company Code						
Motor circuit breaker						
Frame Current	32, 63					
S:Standard						
rated current	010:6.3~10A 032:22~32A	013:9~13A 040:28~40A	016:11~16A 050:35~50A	020:14~20A 063:45~63A	026:18~26A	

accessories : Auxiliary contact, Shunt release, Undervoltage release

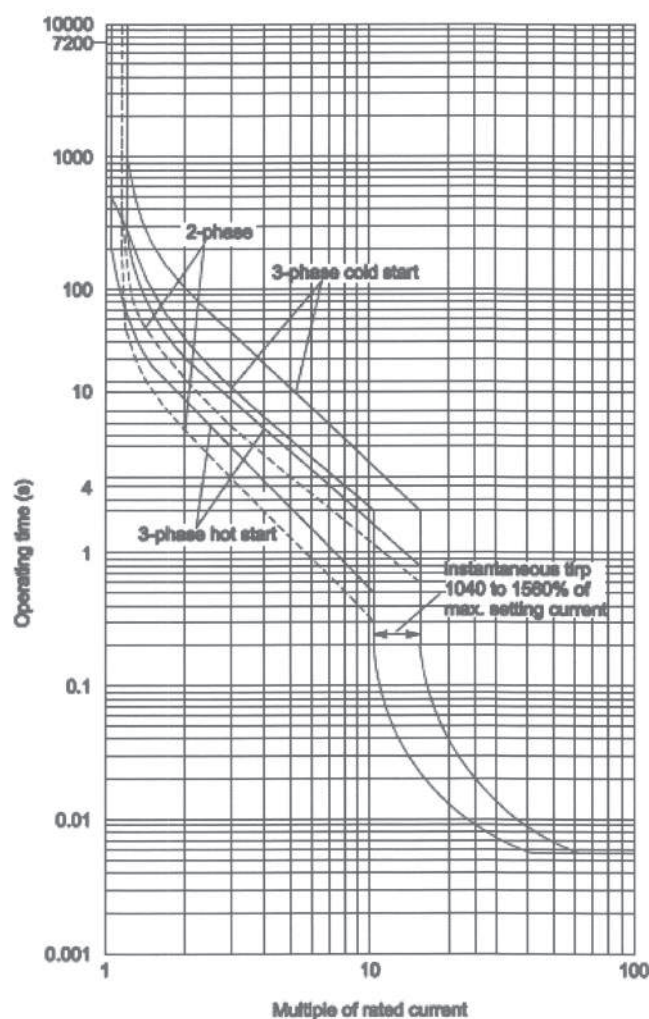
Product Horsepower

According to the standard	Rated Current (A)	Current Class	Single phase		Single phase		
			110-120V	220-240V	220-240V	440-480V	550-600V
UL 60947-4-1	10	6.3-10A	1/2	1/2	3	5	7 1/2
	13	9-13A	1/2	2	3	7 1/2	10
	16	11-16A	1	2	5	10	10
	20	14-20A	1 1/2	3	5	10	15
	26	18-26A	2	3	7 1/2	15	20
	32	22-32A	2	5	10	20	30
	40	28-40A	3	7 1/2	10	30	30
	50	35-50A	3	10	15	30	40
	63	45-63A	5	10	20	40	60

Technical parameters

Model	HCMS-63S		
Rated Current	010:6.3~10A 020:14~20A 040:28~40A	013:9~13A 026:18~26A 050:35~50A	016:11~16A 032:22~32A 063:45~63A
Rated Operational Voltage	690VAC		
Rated insulation voltage	1000VAC		
Trip grade	10		
Operating Frequency	50/60Hz		
Temperature Compensation	YES		
Phase failure protection	YES		
Protection class	IP20		
Mechanical life	500,000		
Electrical life	250,000		
Operation frequency	40op/h		
Allowable operating ambient temperature	-25~+60°C		
Allowable storage ambient temperature	-40~+80°C		
Allowable altitude (m)	3000		
Rated impulse withstand voltage	6kV		
Product certification	UL/CE		

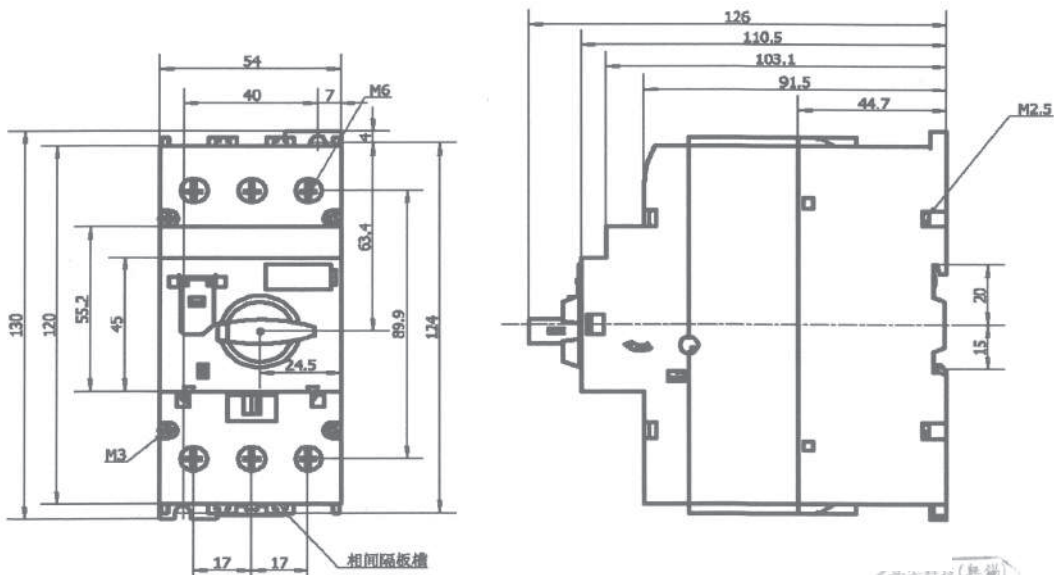
Action characteristic curve (HCMS-63S)



Start-off Capacity

According to the standard	Rated Current (A)	Current Class	Short-circuit protection capacity (kA)					
			220~240V		380~415V		600~690V	
			Icu	Ics	Icu	Ics	Icu	Ics
IEC 60947-2 GB14048.2 EN60947-2	10	6.3-10A	100	100	100	100	4	3
	13	9-13A	100	100	50	38	4	3
	16	11-16A	100	100	25	19	4	3
	20	14-20A	50	38	25	19	4	3
	26	18-26A	50	38	25	19	4	3
	32	22-32A	50	38	25	19	4	3
	40	28-40A	50	38	25	19	4	3
	50	35-50A	50	38	25	19	4	3
63	45-63A	50	38	25	19	4	3	
According to the standard	Rated Current (A)	Current Class	Short-circuit protection capacity (kA)					
			240V	480Y/277V	600Y/347V			
UL 60947-4-1	10	6.3-10A	100	50	10			
	13	9-13A	100	50	10			
	16	11-16A	100	40	10			
	20	14-20A	65	40	10			
	26	18-26A	65	40	10			
	32	22-32A	65	40	10			
	40	28-40A	65	40	10			
	50	35-50A	65	40	10			
63	45-63A	65	40	10				

Mounting dimension (HCMS-63S)



HCMS accessories selection

HCMS	-	X	-	S	-	AB
↑		↑		↑		↑
MOTOR CIRCUIT BREAKER Auxiliary Switch and Alarm Switch accessory		Auxiliary type		Installation site		Contact form
		X: auxiliary contact L: alarm switch A: auxiliary + alarm		S: Side mount, T: Top mount (auxiliary switch only)		AB: 1 NO +1 NC 1A: 1 NO 1B: 1 NC 2A: 2 NO 2B: 2 NC

HCMS	-	S	-	024
↑		↑		↑
MOTOR CIRCUIT BREAKER shunt release		Auxiliary type		Rated voltage
		S: shunt release, U: undervoltage release		024 : 24V 50/60Hz 110 : 110V 50/60Hz 220 : 220V 50/60Hz 380 : 380V 50/60Hz 440 : 440V 50/60Hz

Remark : Suitable for HCMC-32S and HCMC-63S series

Product Parameter

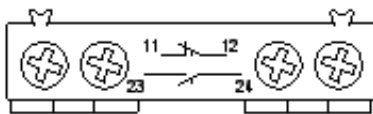
Model		TMS-X-T		TMS-X-S	
Contact composition		1A1B or 1A or 1B		1A1B or 2A or 2B	
Nominal insulation voltage (U _i) IEC/GB (V)		1000			
Rated impulse withstand voltage (U _{imp})IEC/GB (V)		6000			
Conventional heating current (I _{th}) AC/DC		1/5		10/2.5	
Mechanical life thousands of times		10			
Electrical life AC-150,000 times		10			
Protection class		IP20			
Environment Characteristic	Storage temperature (°C)	-40~80			
	Operating temperature (°C)	-25~60 (Unfrozen)			
	Relative humidity (RH)	45~85% (Wet)			
	Allowable altitude (meter)	3000			
Rated current(I _e)	120V	AC- 15/B600	3	AC- 15/A600	6
	240V		1.5		3
	380V		0.95		1.9
	IEC60947-5-1 480V		0.75		1.5
	GB 14048.5 500V		0.72		1.4
	UL 60947-4-1 600V		0.6		1.2
	125V		DC-13		0.22
240V	/R300	0.1	/Q300	0.27	

HCMS accessories selection

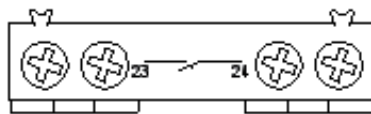
Model		TMS-S	TMS-U
Rated operational voltage		24V、110V、220V、380V、440V	
Working frequency (Hz)		50/60	
Protection class		IP20	
Environment characteristic	Storage temperature (°C)	-40~80	
	Operating temperature (°C)	-25~60 (Unfrozen)	
	Relative humidity (RH)	45~85% (Wet)	
	Allowable altitude (Meter)	3000	
Minimum operating voltage (V)		70%U (Max.)	85%Us (Max.)
Maximum release voltage (V)			70%Us (Max.)

Terminal symbol diagram

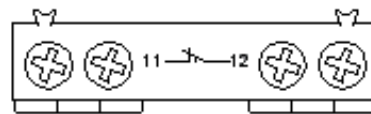
HCMS-X-T-AB



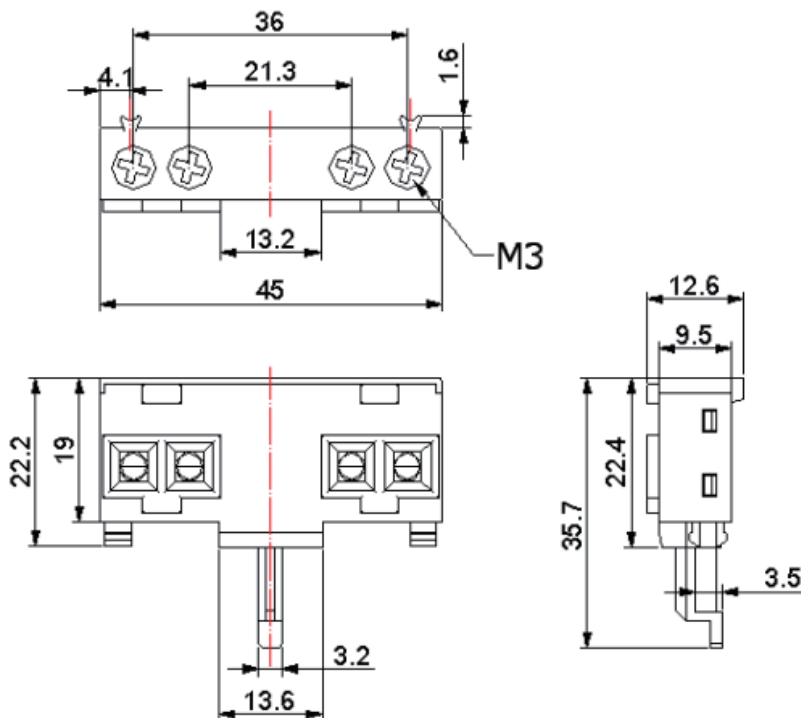
HCMS-X-T-1A



HCMS-X-T-1B

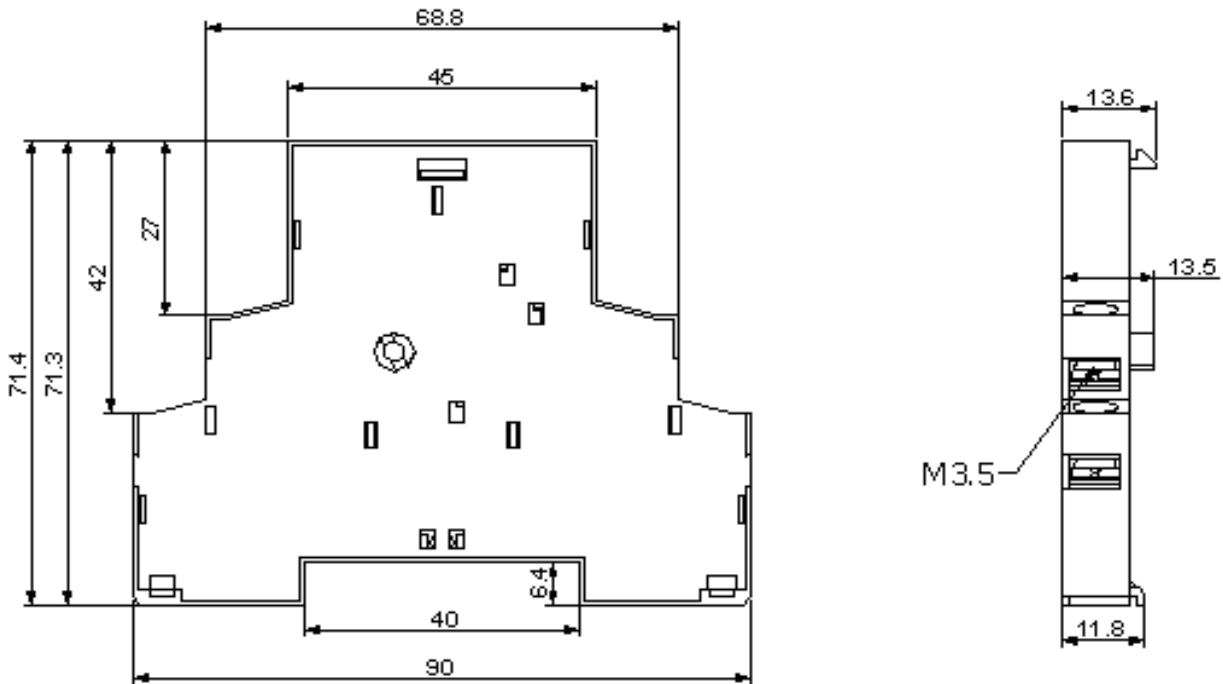


HCMS-X-T External Dimensions: (Unit: mm)



HCMS accessories selection

HCMS-X-S External Dimensions: (Unit: mm)



HCMS-S/U External Dimensions: (Unit: mm)

