

PRODUCT-DETAILS

## MS325-16 MS325-16 Manual Motor Starter



General Information	
Extended Product Type	MS325-16
Product ID	1SAM150000R1012
EAN	4013614194375
Catalog Description	MS325-16 Manual Motor Starter
Long Description	The MS325-16 manual motor starter is a 54 mm width devices with a rated operational current of Ie = 16 A. This device is used to manually switch on and off motors and to protect them reliably and without the need for a fuse from short-circuits, overload and phase failures. The manual motor starter offers a rated service short-circuit breaking capacity Ics = 60 kA at 400 VAC and the trip class 10A. Further features are the build-in disconnect function, temperature compensation, trip-free mechanism and a rotary handle with a clear switch position indication. The manual motor starter is suitable for three- and single-phase applications. Auxiliary contacts, signalling contacts, undervoltage releases, shunt trips, 3-phase bus bars, power in-feed blocks and locking devices for protection against unauthorized changes are available as accessory.

Ordering	
Minimum Order Quantity	1 piece
Customs Tariff Number	85362010
Replacement Product ID (NEW)	1SAM350000R1011

Popular Downloads	
Data Sheet. Technical	

Information

2CDC131046D0201

Instructions and Manuals	2CDC131089M6801
Time-Current Characteristic Curve	1SAM100513F0012

Dimensions	
Product Net Width	54 mm
Product Net Height	87.5 mm
Product Net Depth / Length	75.5 mm
Product Net Weight	0.34 kg

Technical	
Rated Service Short- Circuit Breaking Capacity (I <sub>cs</sub> )	(230 V AC) 100 kA (400 V AC) 60 kA (440 V AC) 40 kA (500 V AC) 25 kA (690 V AC) 4 kA
Rated Ultimate Short- Circuit Breaking Capacity (I <sub>cu</sub> )	(230 V AC) 100 kA (400 V AC) 60 kA (440 V AC) 40 kA (500 V AC) 25 kA (690 V AC) 4 kA
Rated Instantaneous Short-Circuit Current Setting (I¡)	240 A
Setting Range	12.5 16 A
Rated Operational Power AC-3 (P <sub>e</sub> )	(400 V) Three Phase 7.5 kW
Rated Operational Voltage	Main Circuit 690 V AC Main Circuit 440 V DC
Rated Operational Current (I <sub>e</sub> )	16 A
Rated Operational Current AC-3 (I <sub>e</sub> )	16 A
Rated Frequency (f)	Main Circuit 50 Hz Main Circuit 60 Hz
Rated Impulse Withstand Voltage (U <sub>imp</sub> )	Main Circuit 6 kV
Rated Insulation Voltage (Ui)	690 V
Power Loss	at Rated Operating Conditions per Pole 1.0 1.7 W
Number of Poles	3
Mounted Auxiliary Contacts	1 NO, 1 NC
Number of Auxiliary Contacts NC	1
Number of Auxiliary Contacts NO	1
Conventional Free-air Thermal Current (I <sub>th</sub> )	Main Circuit 16 A
Degree of Protection	Housing IP20 Main Circuit Terminals IP20
Pollution Degree	3
Electrical Durability	50000 cycle
Mechanical Durability	100000 cycle
Terminal Type	Screw Terminals
Connecting Capacity Main Circuit	Flexible with Ferrule 1/2x 0.75 4 mm² Flexible with Insulated Ferrule 1/2x 0.75 4 mm² Flexible 1/2x 1 6 mm²

	Rigid 1/2x 1 6 mm²
Tightening Torque	Main Circuit 1.4 N·m
Wire Stripping Length	Auxiliary Circuit 8 mm Main Circuit 10 mm
Recommended Screw	M3.5
Driver	Pozidriv 2
Mounting Position	Position 1 to 6
Mounting on DIN Rail	TH35-15 (35 x 15 mm Mounting Rail) acc. to IEC 60715 TH35-7.5 (35 x 7.5 mm Mounting Rail) acc. to IEC 60715
Actuator Type	Rotary Handle
Contact Position Indication	ON / OFF
Standards	IEC/EN 60947-1
	IEC/EN 60947-2
	IEC/EN 60947-4-1
	UL 60947-1
	UL 60947-4-1

Maximum Operating	Main Circuit 600 V AC
Voltage UL/CSA	
Ampere Rating UL/CSA	16 A
Horsepower Rating	(220 240 V AC) Three Phase 5 Hp
UL/CSA	(440 480 V AC) Three Phase 10 Hp
	(550 600 V AC) Three Phase 10 Hp
Connecting Capacity	Flexible 1/2x 14-8 AWG
Main Circuit UL/CSA	Stranded 1/2x 14-8 AWG
Tightening Torque	Auxiliary Circuit 7 in·lb
UL/CSA	Main Circuit 14 in Ib

Environmental	
Ambient Air Temperature	Around the Enclosure 0 +40 °C Operation -25 +50 °C Operation Compensated -25 +50 °C Storage -50 +80 °C
Ambient Air Temperature Compensation	Yes
Maximum Operating Altitude Permissible	2000 m
Resistance to Shock acc. to IEC 60068-2-27	11 ms Pulse 15g
Resistance to Vibrations acc. to IEC 60068-2-6	5g / 10 150 Hz
RoHS Status	Following EU Directive 2002/95/EC August 18, 2005 and amendment

## Certificates and Declarations (Document Number)

ATEX Certificate	1SAA918000-3903
BV Certificate	1SAA918000-0205
CB Certificate	1SAA918000-2003
CCC Certificate	1SAA918000-3807
cUL Certificate	cUL_E137861 cUL_E345003
Declaration of Conformity - CE	1SAD938517-0003
DNV Certificate	1SAA918000-0306
Environmental Information	1SAA918000-2702
GL Certificate	1SAA918000-0403

GOST Certificate	1SAA918000-2703
Instructions and Manuals	2CDC131089M6801
LR Certificate	1SAA918000-0504
RINA Certificate	1SAA918000-0803
RMRS Certificate	1SAA918000-0704
RoHS Information	1SAD938514-0003
Time-Current Characteristic Curve	1SAM100513F0012
UL Certificate	UL_E137861 UL_E345003

Package Level 1 Units	box 1 piece
Package Level 1 Width	92 mm
Package Level 1 Depth / Length	58 mm
Package Level 1 Height	78 mm
Package Level 1 Gross Weight	0.37 kg
Package Level 1 EAN	4013614194375
Package Level 2 Units	carton 24 piece
Package Level 2 Width	280 mm
Package Level 2 Depth / Length	395 mm
Package Level 2 Height	210 mm
Package Level 2 Gross Weight	0.61 kg
Package Level 2 EAN	4013614494505

Classifications	
Object Classification Code	F
ETIM 4	EC000074 - Motor protective circuit-breaker
ETIM 5	EC000074 - Motor protective circuit-breaker
ETIM 6	EC000074 - Motor protection circuit-breaker
ETIM 7	EC000074 - Motor protection circuit-breaker
eClass	7.0 27370401
UNSPSC	39121521
IDEA Granular Category Code (IGCC)	4845 >> 3 Pole Motor Circuit Protector Circuit Breakers

## Categories

Low Voltage Products and Systems  $\rightarrow$  Circuit Breakers  $\rightarrow$  Manual Motor Starters Low Voltage Products and Systems  $\rightarrow$  Control Products  $\rightarrow$  Manual Motor Starters  $\rightarrow$  Manual Motor Starters

