

TMC 1 F1 100 12,0A - Thermal-magnetic device circuit breaker



0914170

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Thermal-magnetic device circuit breaker, 1-position, connection method: Screw connection, nominal current: 12 A, tripping characteristic: F1 (fast blow), fuse type: Automatic device, mounting type: DIN rail: 35 mm, rated current: 12 A

Commercial data

Item number	0914170
Packing unit	1 pc
Note	Made to order (non-returnable)
Sales key	CL04
Product key	CLA121
GTIN	4017918008857
Weight per piece (including packing)	74.65 g
Weight per piece (excluding packing)	64.79 g
Customs tariff number	85362010
Country of origin	DE

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Technical data

Product properties

Product type	Thermomagnetic device circuit breakers
Product family	TMC
Type	DIN rail module, one-piece
Number of positions	1
Number of connections	4
Number of rows	2

Insulation characteristics

Overvoltage category	II
Degree of pollution	2

Electrical properties

Fuse type	Automatic device
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General

Rated voltage	65 V DC
Rated current I_N	12 A
Rated surge voltage	2.5 kV
Insulation resistance R_{ISO}	> 100 M Ω (500 V DC)
Auxiliary circuit	240 V AC / 1 A (Low-induction) 65 V AC / 1 A (Low-induction)
Tripping method	TM (thermal-magnetic)
Device resistance	0.02 Ω
Rated short-circuit switching capacity I_{cn}	2500 A (32 V DC)
Short-circuit switching capacity	2000 A (UL 1077: 65 V DC)
Dielectric strength	3000 V AC (Actuation area) 3000 V AC (Main to auxiliary circuit)
Switching cycles, max.	10000 (At $1 \times I_N$, inductive)
Fuse	F1 (fast blow)
Contact switching type	1 N/O contact

Connection data

Main contact

Connection method	Screw connection
Screw thread	M3
Tightening torque	0.6 ... 0.8 Nm
Stripping length	12 mm
Internal cylindrical gage	A3
Conductor cross-section rigid	0.2 mm ² ... 6 mm ²

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Cross section AWG	24 ... 10 (converted acc. to IEC)
Conductor cross-section flexible	0.2 mm ² ... 4 mm ²
Conductor cross-section flexible (ferrule without plastic sleeve)	0.25 mm ² ... 4 mm ²
Flexible conductor cross-section (ferrule with plastic sleeve)	0.25 mm ² ... 2.5 mm ²
2 conductors with same cross section, rigid	0.2 mm ² ... 0.75 mm ²
2 conductors with same cross section, flexible	0.2 mm ² ... 0.75 mm ²
2 conductors with same cross section, flexible, with ferrule without plastic sleeve	0.25 mm ² ... 1 mm ²
2 conductors with the same cross section, flexible, with TWIN ferrule with plastic sleeve	0.5 mm ² ... 2.5 mm ²
Nominal current	12 A

Auxiliary contact

Connection method	Screw connection
Screw thread	M3
Tightening torque	0.6 ... 0.8 Nm
Stripping length	12 mm
Internal cylindrical gage	A1
Conductor cross-section rigid	0.2 mm ² ... 2.5 mm ²
Cross section AWG	24 ... 14 (converted acc. to IEC)
Conductor cross-section flexible	0.2 mm ² ... 1.5 mm ²
Conductor cross-section flexible (ferrule without plastic sleeve)	0.25 mm ² ... 2.5 mm ²
Flexible conductor cross-section (ferrule with plastic sleeve)	0.25 mm ² ... 1.5 mm ²
2 conductors with same cross section, rigid	0.2 m ² ... 0.75 m ²
2 conductors with same cross section, flexible	0.2 m ² ... 0.75 mm ²
2 conductors with same cross section, flexible, with ferrule without plastic sleeve	0.25 mm ² ... 0.5 mm ²
2 conductors with the same cross section, flexible, with TWIN ferrule with plastic sleeve	0.5 mm ² ... 0.75 mm ²

Dimensions

Dimensional drawing	
Width	12.5 mm
Height	82.5 mm
Depth	96 mm

Material specifications

Flammability rating according to UL 94	V-2
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Insulating material group	II
Insulating material	PA66

Mechanical properties

Mechanical data

Open side panel	No
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Environmental and real-life conditions

Ambient conditions

Degree of protection	IP30 (Actuation area)
	IP20 (Connection area)
Ambient temperature (operation)	-30 °C ... 60 °C
Humidity test	240 h, 95 % RH, 40 °C

Standards and regulations

Standards/specifications	EN 60934
Standards/specifications	UL 1077

Mounting

Mounting type	DIN rail: 35 mm
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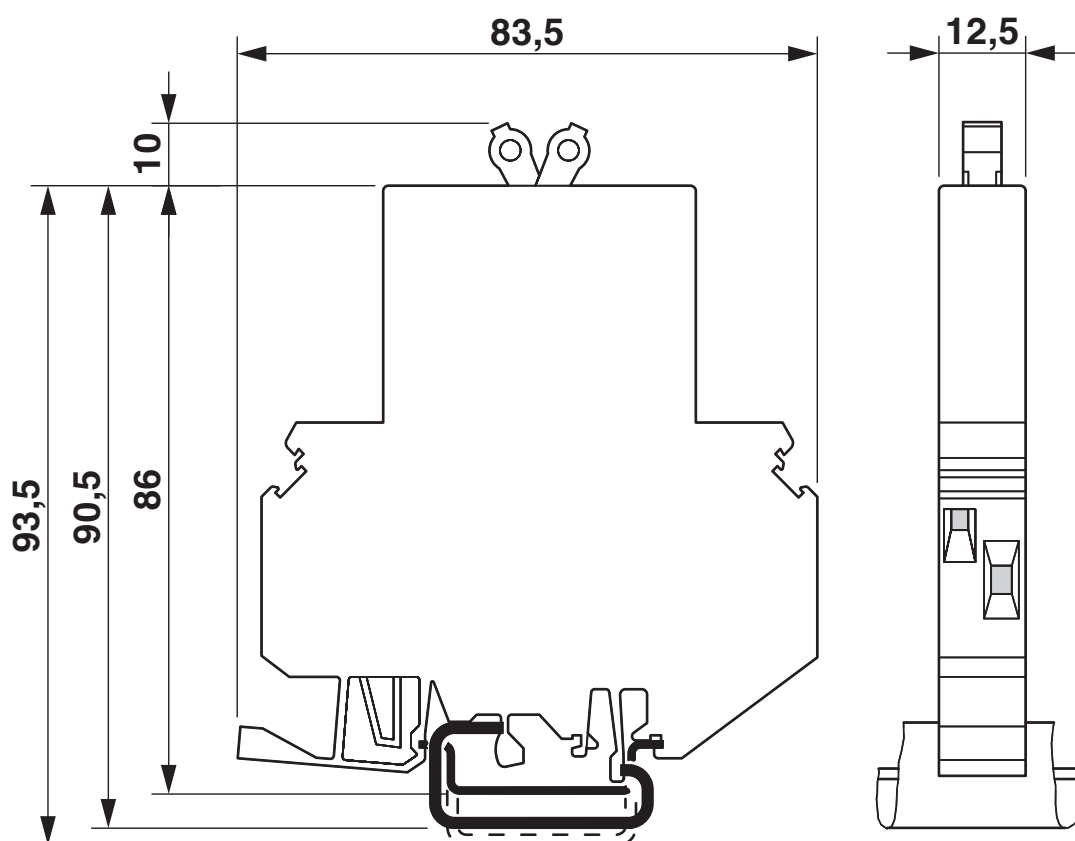


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Drawings

Dimensional drawing



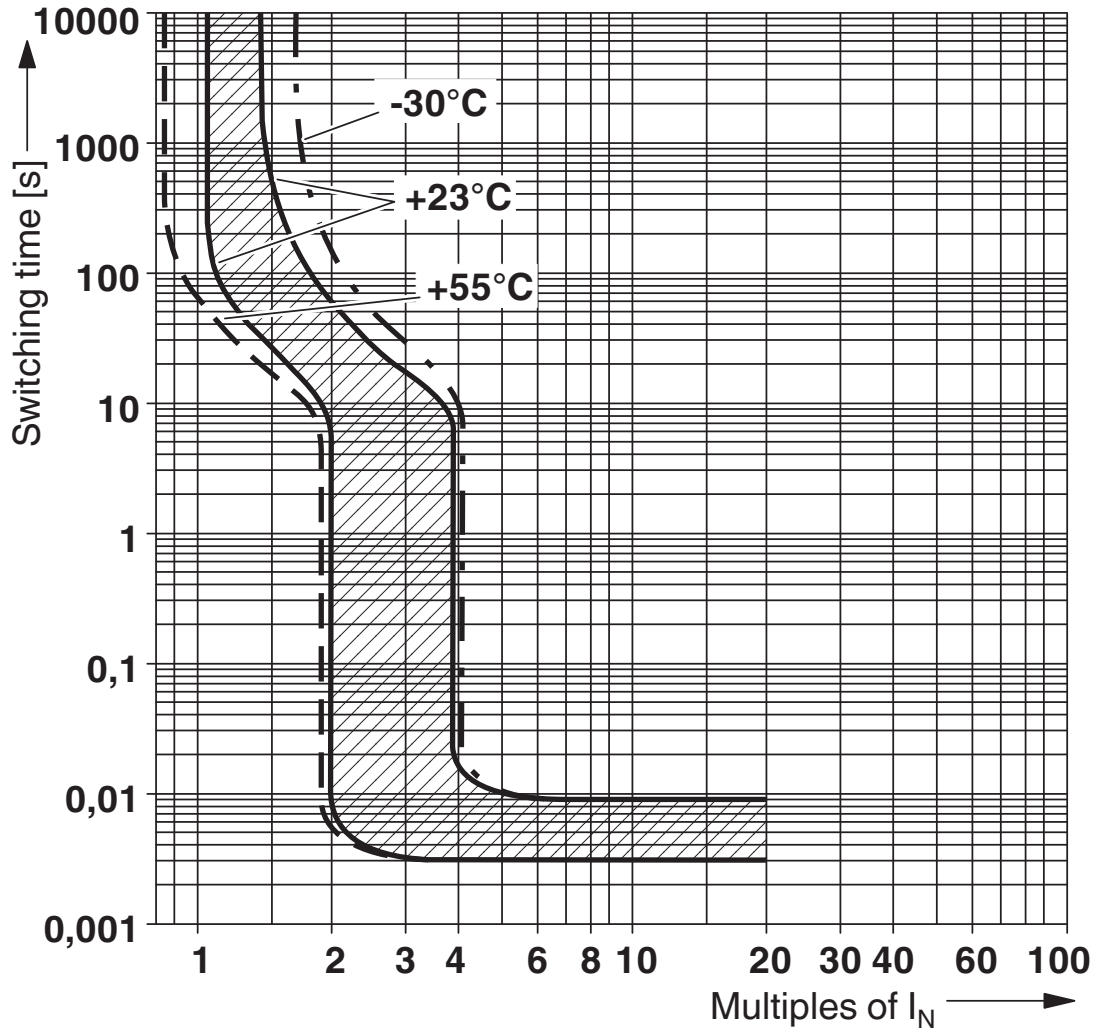
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Diagram



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