HMX310

MCB 3P 50kA C-10A 4.5M

Technical properties

Architecture

Number of protected poles	3
Number of poles	3 P
Type of pole	3 P
Curve	C

Functions

Concurrently switching N-neutral	No

Configuration

Number of modules	4.5

Connectivity

Top connection alignement for modular devices	Aligned terminal
Bottom connection alignement for modular devices	Aligned terminal

Main electrical features

Rated short circuit breaking capacity Icn AC according IEC60898-1	50 kA
Rated operational voltage Ue	415 V
Type of supply voltage	AC
Frequency	50/60 Hz

Voltage

Rated insulation voltage	500 V
Rated impulse withstand voltage	6000 V

Electric current

Rated current	10 A
min/maxi threshold value of the AC thermal operation	1.05 / 1.3 In
Magnetic regulating currrent	5 / 10 In
Rating current -10°C according to IEC 60947	13 A
Rating current -15°C according to IEC 60947	13.55 A
Rating current -20°C according to IEC 60947	13.86 A
Rating current -25°C according to IEC 60947	14.17 A
Rating current -5°C according to IEC 60947	12.94 A

Rating current 0°C according to IEC 60947	12.63 A
Rating current 10°C according to IEC 60947	12.02 A
Rating current 15°C according to IEC 60947	11.71 A
Rating current 20°C according to IEC 60947	11.4 A
Rating current 25°C according to IEC 60947	11.1 A
Rating current 30°C according to IEC 60947	10.4 A
Rating current 35°C according to IEC 60947	10.48 A
Rating current 40°C according to IEC 60947	10 A
Rating current 45°C according to IEC 60947	9.87 A
Rating current 5°C according to IEC 60947	12.33 A
Rating current 50°C according to IEC 60947	9.56 A
Rating current 55°C according to IEC 60947	9.26 A
Rating current 60°C according to IEC 60947	8.95 A
Rating current 65°C according to IEC 60947	8.64 A
Rating current 70°C according to IEC 60947	8.33 A
Rated ultimate short-circuit breaking capacity Icu AC IEC 60947-2	50 kA
Breaking capacity on 1 pole for IT 400V NF 60947-2	4.5 kA
Breaking capacity on 1 pole for IT 415V NF 60947-2	4.5 kA
Rated service breaking capacity Ics AC according IEC 60947-2	50 %
Rated ultimate short-circuit breaking capacity Icu under 230V AC IEC 60947-2	50 kA
Rated ultimate short-circuit breaking capacity Icu under 240V AC IEC 60947-2	50 kA
Rated ultimate short-circuit breaking capacity Icu under 400V AC IEC 60947-2	50 kA
Rated ultimate short-circuit breaking capacity Icu under 415V AC IEC 60947-2	50 kA

Current correction factors

Correction factor of rating current for 2 devices placed side-by-side	1
Correction factor of rating current for 3 devices placed side-by-side	0.95
Correction factor of rating current for 4 and 5 devices placed side-by-side	0.9
Correction factor of rating current for 6 devices placed side-by-side	0.85

Dimensions

Depth of installed product	70 mm
Height of installed product	90 mm
Width of installed product	80 mm

Frequency

Frequency	50 to 60 Hz

Power

Total power loss under IN	6.8 W
Power loss per pole at In	2.28 W

Endurance

Electric endurance in number of cycles	4000
Number of mechanical operations	20000

Installation, mounting

Type of top connection for modular devices	with screw
Type of top rail clip for modular devices	Plastic
Type of bottom rail clip for modular devices	plastic
Type of Bottom Connection for modular devices	with screw
Top removability for modular devices	Yes
Bottom removability for modular devices	Yes

Connection

Connection cross-section at output with screw, for flexible conductor	1 / 50 mm²
Connection cross-section at output with screw, for massive conductor	1 / 70 mm²
Connection cross-section for rigid conductor, upstream terminals with screws	1 / 70 mm²
Connection cross-section of the access with screws, with flexible conductor	1 / 50 mm²
Connection cross-section of input and output with screws, for massive conductors	1 / 70 mm²
Connection cross section of access and exit with screws, for flexible conductor	1 / 50 mm²

Standards

Standard text	IEC 60947-2
European directive WEEE	concerned

Safety

Protection index IP	IP20

Use conditions

Degree of pollution according to IEC 60664 / IEC 60947-2	3
Class of energy limitation I²t	3
Altitude	2000 m

temperatur

Temperature of calibration	40 °C