



HET161NR

Moulded Case Circuit Breaker h3+ P250 Energy 4P4D N0-50-100% 160A 70kA FTC

Technical properties

Architecture

Neutral position	left
Number of protected poles	4
Number of poles	4 P
Fixing mode	Screwed
Type of case	Fixed built-in

Functions

Complete device with protection unit	Yes
Reversing switch	No
Version as main switch	Yes
Version as emergency stop installation	No
Version as safety switch	No
Version as maintenance-/service switch	Yes
Trip Unit	ENERGY
Integrated earth fault protection	No
Concurrently switching N-neutral	Yes

Controls and indicators

Motor drive integrated	No
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Main electrical features

Rated operational voltage Ue	220 / 690 V
Type of supply voltage	AC
Frequency	50/60 Hz

Voltage

Rated insulation voltage	800 V
Rated impulse withstand voltage	8 kV
With under voltage release	No

Electric current

Rated current	160 A
Rated ultimate short-circuit breaking capacity Icu under 690V AC IEC 60947-2	6 kA
Rated short-time withstand current Icw t=0.4S 220-240 V AC according IEC 60947-2	2.5 kA
Rated short-time withstand current Icw t=0.4S 380-415 V AC according IEC 60947-2	2.5 kA
Rated short-time withstand current Icw t=0.4S 660-690 V AC according IEC 60947-2	2.5 kA

Rating current 10°C according to IEC 60947	160 A
Rating current 15°C according to IEC 60947	160 A
Rating current 20°C according to IEC 60947	160 A
Rating current 25°C according to IEC 60947	160 A
Rating current 30°C according to IEC 60947	160 A
Rating current 35°C according to IEC 60947	160 A
Rating current 40°C according to IEC 60947	160 A
Rating current 45°C according to IEC 60947	160 A
Rating current 50°C according to IEC 60947	160 A
Rating current 55°C according to IEC 60947	160 A
Rating current 60°C according to IEC 60947	160 A
Rating current 65°C according to IEC 60947	160 A
Rating current 70°C according to IEC 60947	150 A
Rated service breaking capacity Ics under 660V AC according IEC 60947-2	6 kA
Breaking capacity on 1 pole for IT 230V NF 60947-2	2.5 kA
Breaking capacity on 1 pole for IT 400V NF 60947-2	2.5 kA
Breaking capacity on 1 pole for IT 415V NF 60947-2	2.5 kA
Rated ultimate short-circuit breaking capacity Icu under 230V AC IEC 60947-2	85 kA
Rated ultimate short-circuit breaking capacity Icu under 240V AC IEC 60947-2	85 kA
Rated ultimate short-circuit breaking capacity Icu under 400V AC IEC 60947-2	70 kA
Rated ultimate short-circuit breaking capacity Icu under 415V AC IEC 60947-2	70 kA
Rated service breaking capacity Ics under 110-138V AC according IEC 60947-2	85 kA
Rated ultimate short-circuit breaking capacity Icu under 220V AC IEC 60947-2	85 kA
Rated ultimate short-circuit breaking capacity Icu under 380V AC IEC 60947-2	70 kA
Rated ultimate short-circuit breaking capacity Icu under 660V AC IEC 60947-2	6 kA
Dimensions	
Depth of installed product	97 mm
Height of installed product	165 mm
Width of installed product	140 mm
Frequency	
Frequency	50 to 60 Hz
Power	
Total power loss under IN	18.42 W
Power loss per pole at In	6.14 W
Endurance	
Electric endurance in number of cycles	10000
Number of mechanical operations	40000

Subject to technical modifications

Cover, door	
Interlockable	Yes
Installation, mounting	
Tightening torque	12Nm
DIN rail mounting with optional adaptor	No
Suitable for front mounting center	No
Suitable for front mounting	No
Suitable for ground mounting	Yes
Connection	
Connection cross-sect. flexible conductor	35 / 150mm ²
Type of connection	Terminal
Protection	
Instantaneous protection (li): type	adjustable
Cable	
Cable Material	Cu / Al
Equipment	
Number of auxiliary contacts as normally closed contact	0
Number of auxiliary contacts as normally open contact	0
Number of auxiliary contacts as change-over contact	0
Motor drive optional	Yes
Can be accessorized	Yes
Use	
Vibrations and shocks withstand	IEC 68068-2-52 Test FC
Standards	
European directive WEEE	concerned
Safety	
REACH conform	No
RoHS conform	Yes
Halogen free	No
Use conditions	
Degree of pollution according to IEC 60664 / IEC 60947-2	3
Altitude	2000 m