



HEF990H

Moulded Case Circuit Breaker h1600 3P 70kA 1600A LSI

Technical properties

Architecture

Number of poles	3 P
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Functions

Complete device with protection unit	Yes
Trip Unit	LSI
Integrated earth fault protection	No

Configuration

Number of modules	12
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Main electrical features

Rated operational voltage Ue	220 / 690 V
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	1600 A
Rated ultimate short-circuit breaking capacity Icu under 690V AC IEC 60947-2	45 kA
Thermal protection nob setting xIN	0.4 / 0.5 / 0.63 / 0.8 / 0.9 / 0.95 / 1
Breaking capacity on 1 pole for IT 230V NF 60947-2	60 kA
Breaking capacity on 1 pole for IT 400V NF 60947-2	9 kA
Rated service breaking capacity Ics AC according IEC 60947-2	71 %
Rated ultimate short-circuit breaking capacity Icu under 230V AC IEC 60947-2	100 kA
Rated ultimate short-circuit breaking capacity Icu under 240V AC IEC 60947-2	100 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 ultimate short-circuit breaking capacity Icu under 440V AC IEC 60947-2	70 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	1
Correction factor of rating current for 4 and 5 devices placed side-by-side	1
Correction factor of rating current for 6 devices placed side-by-side	1
Power	
Total power loss under IN	168.9 W
Power loss per pole at In	56.3 W
Tripping	
Tripmode	LSI
Thermal protection trip time	5 / 10 / 11 / 19 / 21 / 29 ms
Time of response when opening	10 ms
Electrical specifications	
Magnetic trip delay time	100 to 200 ms
Endurance	
Electric endurance in number of cycles	1000
Number of mechanical operations	4000
Installation, mounting	
DIN rail mounting with optional adaptor	No
Connection	
Type of connection	Terminal
Settings	
Range of the magnetic adjustment	8960 / 11200 / 14000 / 17920 / 19200 / 19200 / 19200 A
Magnetic protection nob setting xIN	2.5 / 5 / 10
Setting type In or Ith	IrTh
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
Use cases	
Category of use	A
Standards	
Standard text	IEC 60947-2
European directive WEEE	concerned
Use conditions	

Operating temperature	-25...70 °C
Altitude	2000 m
Storage/transport temperature	-35...70 °C