



MCB 1P 10kA D-25A 1M

NDN125A



NDN125A

Architecture

| | |
|---------------------------|-----------------|
| Neutral position | without neutral |
| Number of protected poles | 1 |
| Number of poles | 1 P |
| Type of pole | 1 P |
| Curve | D |

Connectivity

| | |
|---|------------------|
| Bottom connection alignment for modular devices | Aligned terminal |
| Top connection alignment for modular devices | Aligned terminal |

Main electrical features

| | |
|------------------------------|-----------|
| Type of supply voltage | AC |
| Rated operational voltage Ue | 240/415 V |

Voltage

| | |
|------------------------------------|--------|
| Minimum threshold voltage (Ue min) | 12 V |
| Rated insulation voltage | 500 V |
| Max operating voltage | 440 V |
| Rated impulse withstand voltage | 6000 V |

Electric current

| | |
|---|--------|
| Rated short circuit breaking capacity Icn under 230V AC according IEC60898-1 | 10 kA |
| Rated short circuit breaking capacity Icn under 240V AC according IEC 60898-1 | 10 kA |
| Rated service breaking capacity Ics AC according IEC 60898-1 | 7,5 kA |
| Rated service breaking capacity Ics under 220V AC according IEC 60947-2 | 7,5 kA |
| Rated service breaking capacity Ics under 230V AC according IEC 60947-2 | 7,5 kA |
| Rated service breaking capacity Ics under 240V AC according IEC 60947-2 | 7,5 kA |
| Rated service breaking capacity Ics under 220V AC according IEC 60898-1 | 7,5 kA |
| Rated service breaking capacity Ics under 230V AC according IEC 60898-1 | 7,5 kA |

Technical Properties

| | |
|--|--------------|
| Rated service breaking capacity Ics under 240V AC according IEC 60898-1 | 7,5 kA |
| Rated ultimate short-circuit breaking capacity Icu under 220V AC IEC 60947-2 | 15 kA |
| Rated ultimate short-circuit breaking capacity Icu under 230V AC IEC 60947-2 | 15 kA |
| Rated ultimate short-circuit breaking capacity Icu under 240V AC IEC 60947-2 | 15 kA |
| Magnetic regulating current at 40° C | 10/14,4 In |
| min/maxi threshold value of the DC magnetic operation | 15/30 In |
| min/maxi threshold value of the AC thermal operation | 1,13/1,45 In |
| min/maxi threshold value of the DC thermal operation | 1,13/1,45 In |

Electric current / temperature

| | |
|---|---------|
| Rating current -15°C | 30,35 A |
| Rating current -20°C | 30,89 A |
| Rating current 0°C | 28,68 A |
| Rating current 10°C | 27,51 A |
| Rating current -10°C | 29,8 A |
| Rating current 25°C | 25,65 A |
| Rating current -25°C | 31,41 A |
| Rating current 30°C | 25 A |
| Rating current 35°C | 24,33 A |
| Rating current 40°C | 23,65 A |
| Rating current 45°C | 22,94 A |
| Rating current 5°C | 28,1 A |
| Rating current -5°C | 29,24 A |
| Rating current 50°C | 22,21 A |
| Rating current 55°C | 21,46 A |
| Rating current 60°C | 20,68 A |
| Rating current 65°C | 19,87 A |
| Rating current 70°C | 19,02 A |
| Rating current 0°C according to IEC 60947-2 | 32,27 A |
| Rating current 10°C according to IEC 60947-2 | 30,96 A |
| Rating current -10°C according to IEC 60947-2 | 33,54 A |
| Rating current 150°C according to IEC 60947-2 | 30,28 A |
| Rating current -15°C according to IEC 60947-2 | 34,16 A |
| Rating current 20°C according to IEC 60947-2 | 29,58 A |
| Rating current -20°C according to IEC 60947-2 | 34,76 A |
| Rating current 25°C according to IEC 60947-2 | 28,87 A |
| Rating current -25°C according to IEC 60947-2 | 35,36 A |
| Rating current 30°C according to IEC 60947-2 | 28,14 A |
| Rating current 35°C according to IEC 60947-2 | 27,39 A |
| Rating current 40°C according to IEC 60947-2 | 26,61 A |
| Rating current 45°C according to IEC 60947-2 | 25,82 A |
| Rating current 5°C according to IEC 60947-2 | 31,62 A |
| Rating current -5°C according to IEC 60947-2 | 32,91 A |
| Rating current 50°C according to IEC 60947-2 | 25 A |
| Rating current 55°C according to IEC 60947-2 | 24,15 A |
| Rating current 60°C according to IEC 60947-2 | 23,27 A |
| Rating current 65°C according to IEC 60947-2 | 22,36 A |
| Rating current 70°C according to IEC 60947-2 | 21,41 A |

Current correction factors

| | |
|---|------|
| Correction factor of magnetic tripping with 100 Hz | 1,1 |
| Correction factor of magnetic tripping with 200 Hz | 1,2 |
| Correction factor of magnetic tripping with 400 Hz | 1,5 |
| Correction factor of magnetic tripping with 60 Hz | 1,1 |
| Correction factor of rating current for 2 devices placed 1 side-by-side | |
| 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 |

Power

| | |
|---|--------|
| Power loss per pole at In | 3,37 W |
| Maximum power loss per pole according to the product standard | 4,5 W |
| Total power loss under IN | 3,37 W |

Endurance

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

Dimensions

| | |
|-----------------------------|---------|
| Depth of installed product | 70 mm |
| Height of installed product | 83 mm |
| Width of installed product | 17,5 mm |

Installation, mounting

| | |
|---|------------|
| Type of top connection for modular devices | with screw |
| Tightening torque | 2,8Nm |
| Type of bottom rail clip for modular devices | plastic |
| Type of top rail clip for modular devices | NA |
| Type of Bottom Connection for modular devices | Blconnect |
| Bottom removability for modular devices | yes |
| Top removability for modular devices | yes |
| Suitable for flush-mounting | yes |

Connection

| | |
|--|----------------------|
| Upstream cage clamp delivery status | opened |
| Downstream cage clamp delivery status | opened |
| Connection cross-section at output with screw, for flexible conductor | 1/25 mm ² |
| Connection cross-section of the access with screws, with flexible conductor | 1/25 mm ² |
| Connection cross-section at output with screw, for massive conductor | 1/35 mm ² |
| Connection cross-section for rigid conductor, upstream terminals with screws | 1/35 mm ² |

Equipment

| | |
|---------------------|-----|
| Can be accessorized | yes |
|---------------------|-----|

Standards

| | |
|-------------------------|----------------------------|
| Standard text | EN 60898-1, AS/NZS 60898-1 |
| European directive WEEE | concerned |

Safety

| | |
|---------------------|------|
| Protection index IP | IP20 |
|---------------------|------|

Use conditions

| | |
|--|--------------|
| Degree of pollution according to IEC 60664 / IEC 60947-2 | 2 |
| Altitude | 2000 m |
| Storage temperature | -25 to 80 °C |

temperatur

| | |
|----------------------------|-------|
| Temperature of calibration | 30 °C |
|----------------------------|-------|