File number	NDT2930192	Version	0 version	Date	20160620

1 Application

●Protection against short circuit

●Protection against overload

●earth leakage Protection

●Isolation

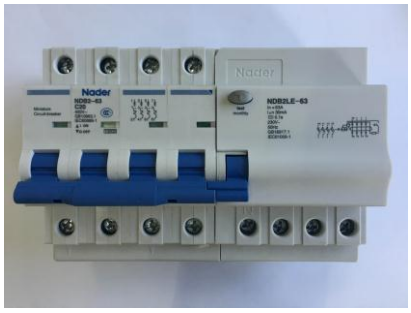
NDB2LE-63 series residual current unit clipped onto the right side of NDB2-63 series MCBs to protection against earth leakage faults ，which is used in low voltage electrical distribution system in industry, real estate, power, telecom and construction field.

2 Picture

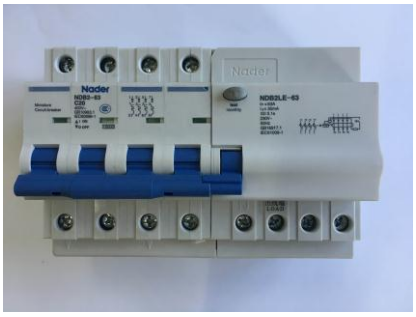
1P+N

2P

3P



3P+N



4P

3 Model:

ND	B	2	L	E	—	63	□	□	/	□
Nader	MCB	Design Code	Earth Leakage Protection	Electronic type		Framework 63A	Tripping Curve B Curve C Curve D Curve	Rated current 1A, 2A, 4A, 6A, 10A, 16A, 20A, 25A, 32A, 40A,50A, 63A		Poles 1P+N 2P 3P+N 3P 4P

4 Main technical parameters

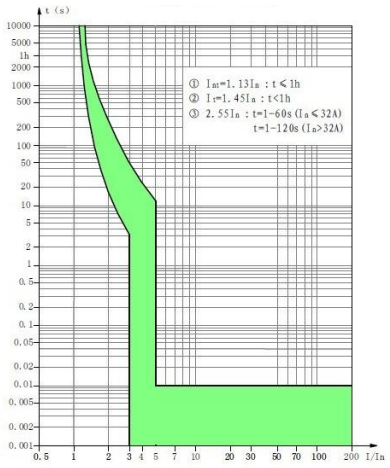
- Electrical parameters
  - Rated working voltage (Ue):AC230/240V(1P+N、2P)　AC380/400/415V(3P、3P+N、4P)
  - Rated working frequency：50/60Hz
  - Rated current (In): 1A, 2A, 4A, 6A, 10A, 16A, 20A, 25A, 32A, 40A, 50A, 63A
  - Breaking capacity (Icn):10kA
  - Rated residual operating current:30mA、50mA、100mA、300mA
  - Rated residual operating time：≤0.1s
  - Rated residual making and breaking capacity（IΔm）：600A
  - Mechanical & electrical life: 10000 times
- Isolation function：
  - Overcurrent visualization
- Wiring
  - Adopt tunnel type wiring
  - Connection capability: 1mm^2 to 35 mm^2
- Meet a criterion
  - GB 16917.1、IEC 61009-1、GB16917.22、IEC61009-2-2

5 Working conditions

- Altitude: ≤2000m
- Ambient temperature: －25℃~＋55℃
- Storage temperature: －30℃~＋70℃
- Relative air humidity ≤95%
- Pollution degree: 2

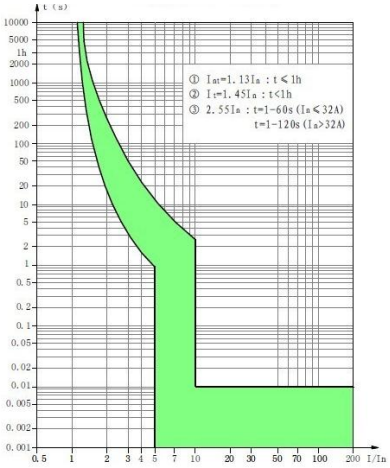
6 Tripping curves (ambient temperature 30℃)

- B curve
  - Non-inductive or micro-inductive loads
  - Rated current：1~63A
  - Tripping characteristic: instantaneous trip between 3In to 5In.



B Curve

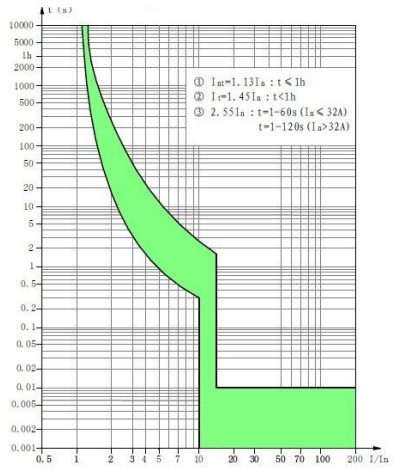
- C curve
  - ○ Illumination distribution system
  - ○ Rated current：1~63A
  - ○ Tripping characteristic: instantaneous trip between 5In to 10In



C Curve

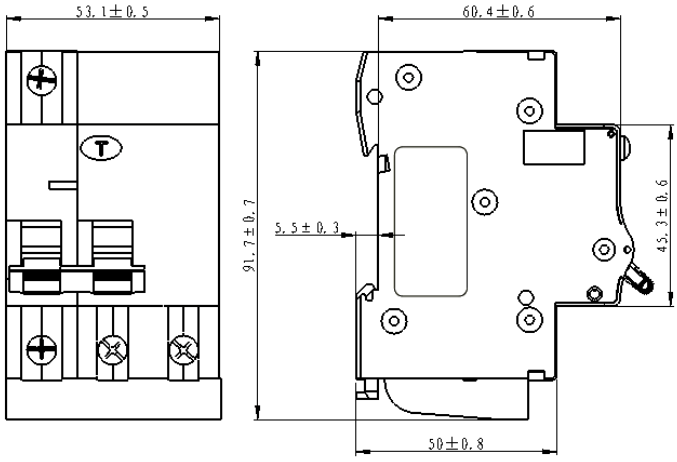
- D curve
  - ○ Industrial distribution system
  - ○ Rated current：1~63A
  - ○ Tripping characteristic: instantaneous trip between 10In to 14In

File number	NDT2930192	Version	0 version	Date	20160620

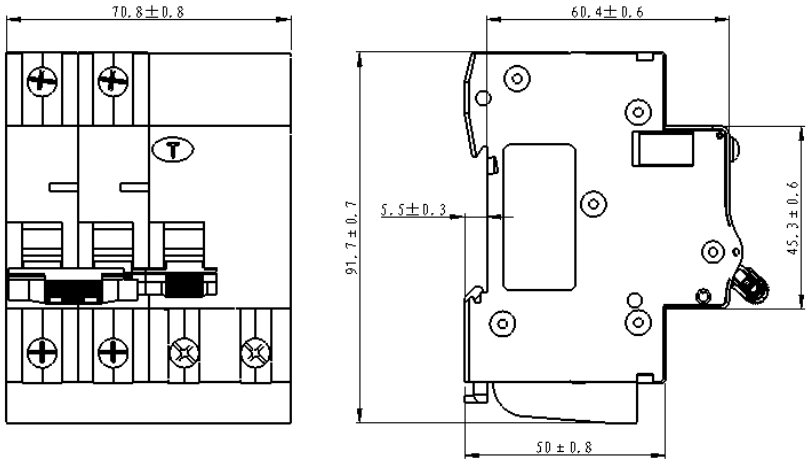


D Curve

7 Outline dimensions and installation

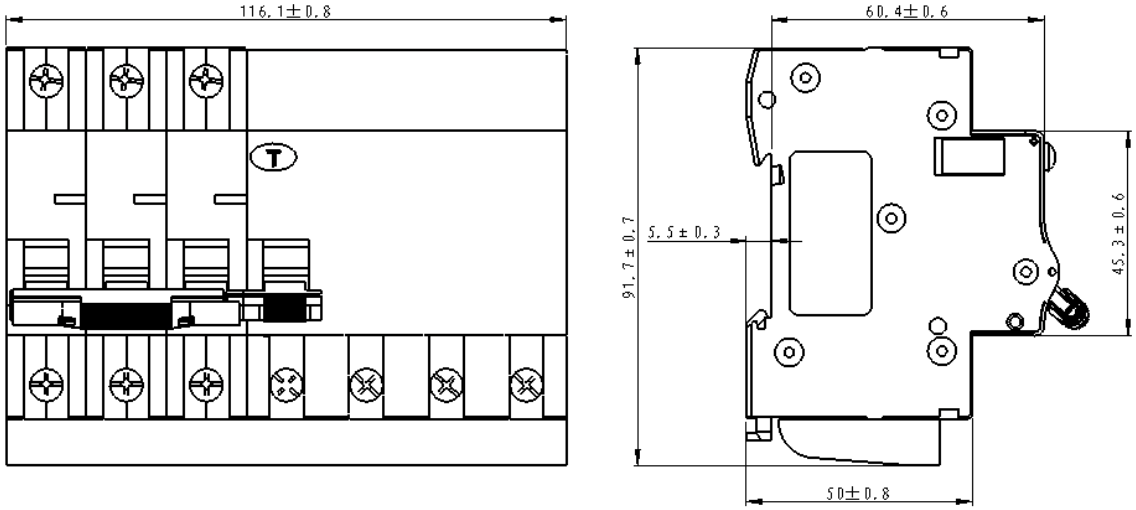


1P+N

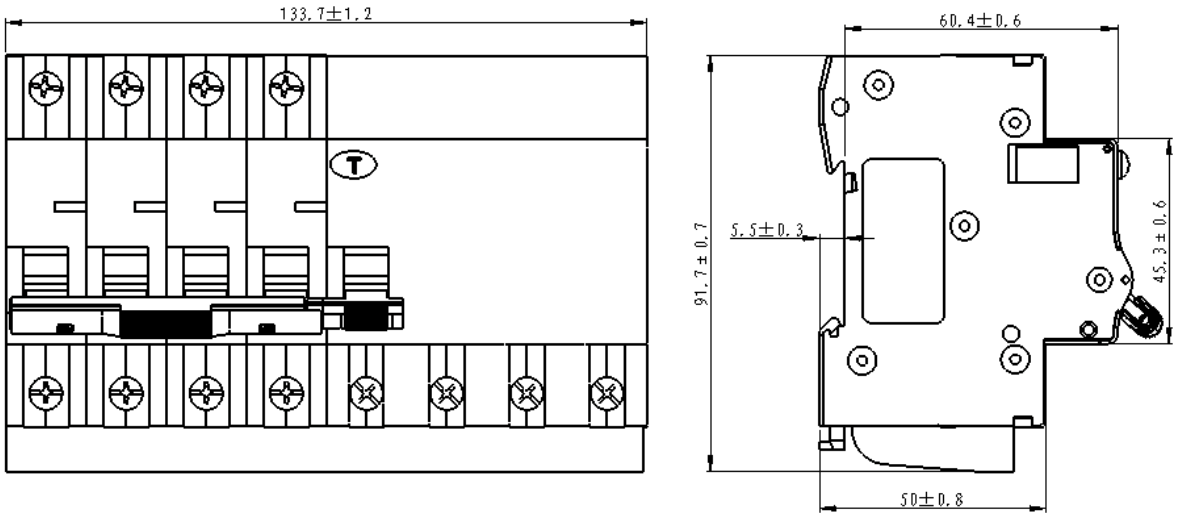


2P

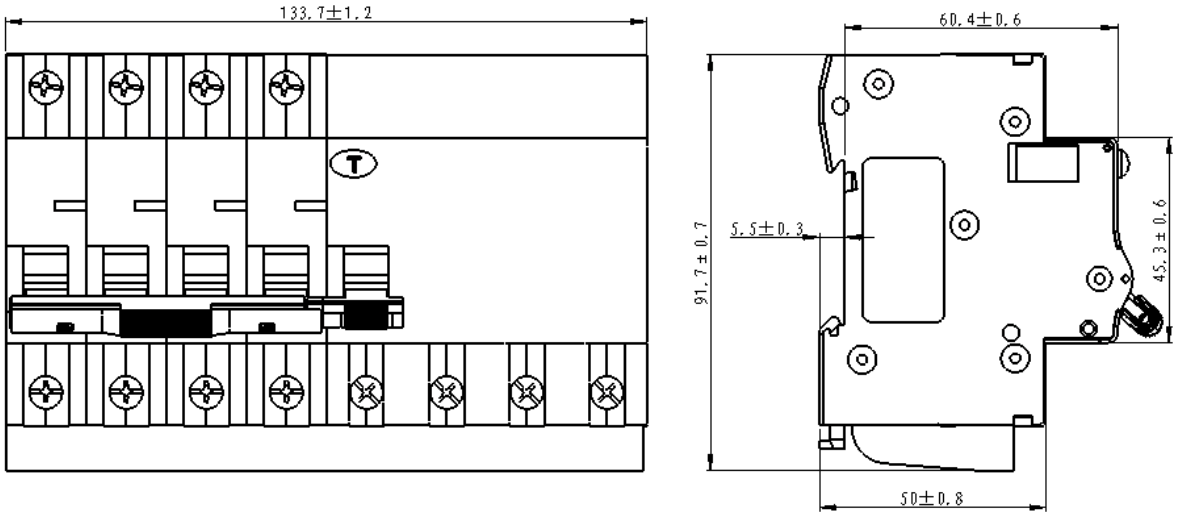
File number	NDT2930192	Version	0 version	Date	20160620



3P



3P+N



4P

8 Mounting

Modularized structure, can be easily installed in TH35mm×7.5 Standard DIN rail.

9 Packaging and storage

9.1 Maximum packing quantity

1N-pole: 4 pieces in a box, 12 boxes in an overwrap carton.

2-pole: 3 pieces in a box, 12 boxes in an overwrap carton.

3-pole: 2 pieces in a box, 12 boxes in an overwrap carton.

3N-pole: 1 pieces in a box, 12 boxes in an overwrap carton.

4-pole: 1 pieces in a box, 12 boxes in an overwrap carton.

9.2 The products should be stored in the warehouse where there is ventilation. The relative humidity there should not exceed 80%, and the ambient temperature there is between -30℃ to +70℃. In addition, there should not be acidic, alkaline and corrosive gas in the air. The products should not be deposited more than 3 years in the above mentioned conditions since the producing date.

10 Accessories

● OF2 auxiliary contact: Installed on the left hand of the NDB2LE-63 series RCBOs to indicate tripping status of the breaker.

● SD2 alarm contact: Installed on the left hand of the NDB2LE-63 series RCBOs to indicate failure tripping status of the breaker.

●MX+OF2 shunt trip release :Installed on the left hand of NDB2LE- 63 series RCBOs, remote control of the circuit breaker's tripping;

11 Notices

11.1 Take no responsibility for problems occurred by disassembly privately.

11.2 RCBO can't provide protection in the cases that touch two phase line synchronously.

11.3 Please don't perform insulating resistance test or voltage-withstand test on the product directly or indirectly by megohmmeter or similar test devices. If you need, we can offer validated certificate about the term.

11.4 When test insulating resistance of the engineering circuit, the outlet terminal (at least one line) must be disconnected to avoid the misunderstanding of the products' quality or damage of the products.

11.5 The power line should be connected to 'LINE', while another terminal to 'LOAD'. Don't connect contrarily. Otherwise the product will be damaged when the test button is pressed or there is earth leakage in the circuit.

11.6 Please make sure reliable connection to avoid fault tripping or damage of terminals caused by exceptional heat resulting from unsuitable connection.

11.7 Simulating test should be made once a month by pressing the test button to check whether the circuit breaker works normally. If RCBO is abnormal, it should be replaced.

11.8 When RCBO opens automatically, line analyzing or equipment checking should be done to find the causation of failure. Then switch on only after eliminating the malfunction.