

MODEL AND SIGNIFICANCE

|              |               |   |            |               |       |               |               |                         |
|--------------|---------------|---|------------|---------------|-------|---------------|---------------|-------------------------|
| S            | L7N           | - | 63         | C32           | /2P   | II            | G             | MX+OFI                  |
| Suntree code | Design number |   | Frame size | Rated current | Poles | Rated voltage | Wiring method | Accessories and voltage |

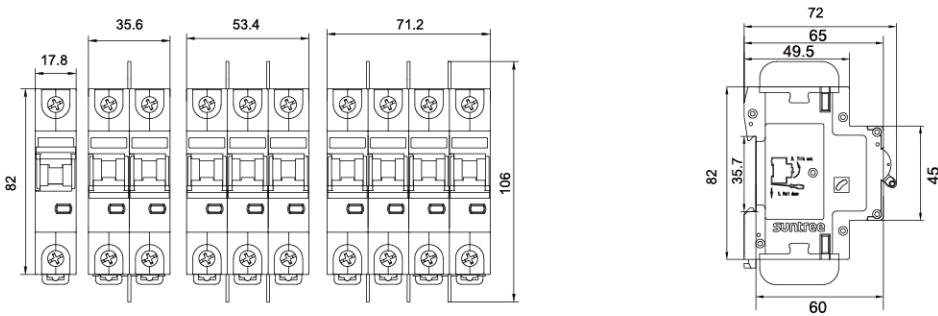
DESIGN NUMBER

- DC non-polarized
- Low temperature rise
- V0 (UL94) flame-retardant materials used for the case
- All current-carrying parts are copper
- ROHS compliant
- Versatile accessory options
- Instrumentation parts are all made of stainless steel

FUNCTION AND SCOPE OF APPLICATION

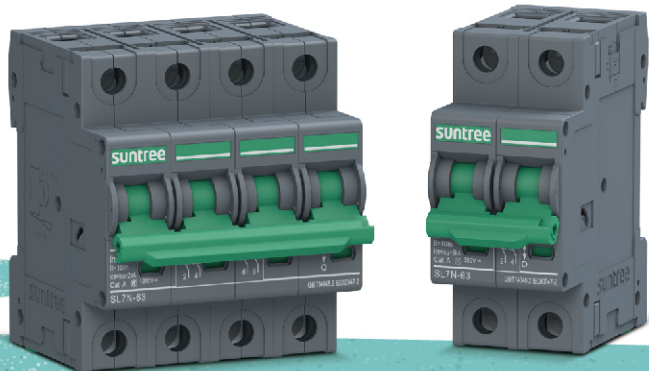
SL7N-63 series PV miniature circuit breaker is a current-limiting circuit breaker with overload and short circuit protection, overload and short circuit protection for DC systems with voltage DC1200V and below. Widely used in DC panels, DC distribution cabinets, DC convergence boxes, distribution box systems for energy storage, PV and wind power stations, and communication distribution box protection systems. It can also be used for infrequent on/off conversion of lines under normal conditions.

MOUNTING DIMENSIONS



DC circuit breaker

- SL7N-63/1P
- SL7N-63/2P
- SL7N-63/3P
- SL7N-63/4P



PRODUCT MODEL

| Model   | Appearance | Characteristic | Current A                                         | Voltage V    | Wiring Method | Optional accessories | Accessory name                                                              | Accessory name                                               |
|---------|------------|----------------|---------------------------------------------------|--------------|---------------|----------------------|-----------------------------------------------------------------------------|--------------------------------------------------------------|
| SL7N-63 | 1P         | B/C            | 6<br>10<br>16<br>20<br>25<br>32<br>40<br>50<br>63 | I:15         | -             | -                    | OF<br>20F<br>SD<br>OF+SD                                                    | -                                                            |
| SL7N-63 | 1P         |                |                                                   | II:24        | -             |                      |                                                                             |                                                              |
| SL7N-63 | 1P         |                |                                                   | III:48       | -             |                      |                                                                             |                                                              |
| SL7N-63 | 1P         |                |                                                   | IV:60        | -             |                      |                                                                             |                                                              |
| SL7N-63 | 1P         |                |                                                   | V:100        |               |                      |                                                                             |                                                              |
| SL7N-63 | 1P         |                |                                                   | VI:180       | H             |                      |                                                                             |                                                              |
| SL7N-63 | 1P         |                |                                                   | Default:250  | H             |                      |                                                                             |                                                              |
| SL7N-63 | 2P         |                |                                                   | II:24        | H             |                      | MX<br>MX+OF<br>OF+MX+OF<br>20F+MX+OF<br>SD+MX+OF<br>OF+SD+MX<br>OF+SD+MX+OF | I:DC12V<br>II:DC24V-48V<br>III:DC110V-400V<br>IV:AC220V-380V |
| SL7N-63 | 2P         |                |                                                   | III:48       | H             |                      |                                                                             |                                                              |
| SL7N-63 | 2P         |                |                                                   | IV:125       | H             |                      |                                                                             |                                                              |
| SL7N-63 | 2P         |                |                                                   | V:375        | G             |                      |                                                                             |                                                              |
| SL7N-63 | 2P         |                |                                                   | Default:500  | G             |                      |                                                                             |                                                              |
| SL7N-63 | 2P         |                |                                                   | VI:550       | G             |                      |                                                                             |                                                              |
| SL7N-63 | 2P         |                |                                                   | VII:600      | G             |                      |                                                                             |                                                              |
| SL7N-63 | 2P         |                |                                                   | VIII:800     | G             |                      |                                                                             |                                                              |
| SL7N-63 | 2P         |                |                                                   | Default:750  | H             |                      |                                                                             |                                                              |
| SL7N-63 | 2P         |                |                                                   | I:900        | H             |                      |                                                                             |                                                              |
| SL7N-63 | 3P         |                |                                                   | Default:1000 | G             |                      | OF+MN<br>SD+MN<br>OF+SD+MN                                                  | AC230V<br>AC400V                                             |
| SL7N-63 | 3P         |                |                                                   | I:1200       | G             |                      |                                                                             |                                                              |
| SL7N-63 | 4P         |                |                                                   |              |               |                      |                                                                             |                                                              |
| SL7N-63 | 4P         |                |                                                   |              |               |                      |                                                                             |                                                              |

CONFORMS TO STANDARD

GB/T 14048.2-2020 Low-voltage Switchgear and Controlgear

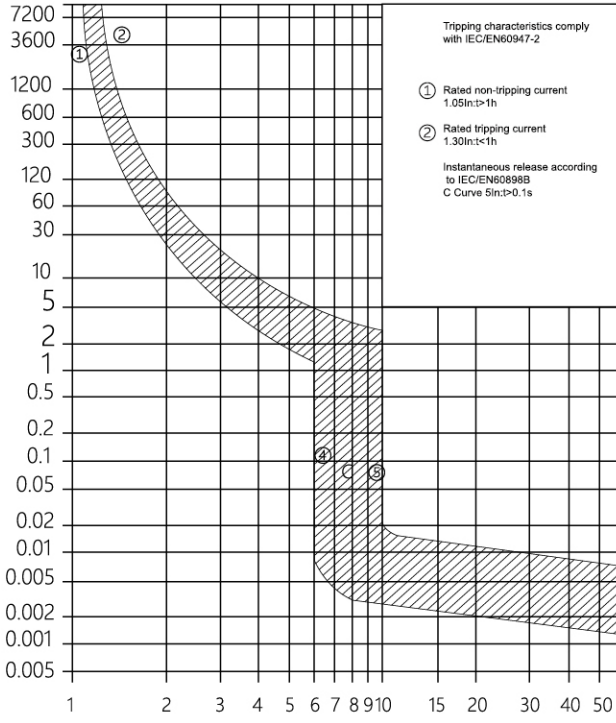
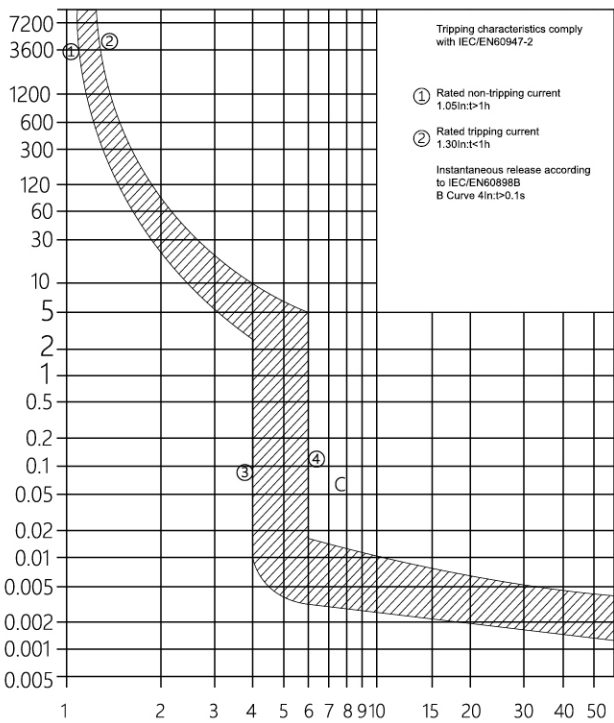
INSTALLATION PRECAUTIONS

- In a medium without explosion risk and free of gases and dust(including conductive dust) sufficient to corrode metal and destroy insulation
- In the condition with no snow erosion
- It can be installed horizontally and vertically
- The magnetic field of the installation position shall not exceed 5 times the geomagnetic field in any direction;
- It should not be installed in flammable and explosive places
- There should be no significant impact and vibration at the installation place

MAIN TECHNICAL PARAMETERS

| Items                                                  | Technical parameters                                                                                                           |
|--------------------------------------------------------|--------------------------------------------------------------------------------------------------------------------------------|
| Rated insulation voltage (Ui)                          | 1250V                                                                                                                          |
| Rated operational voltage (Ue)                         | DC(1P):15V,24V,48V,60V,100V, 180V,250V;<br>DC(2P):24V,48V,125V,375V,500V,550V,600V,800V<br>DC(3P):750V,900V;DC(4P):1000V,1200V |
| Frame rated current                                    | 63A                                                                                                                            |
| Different current of the same frame ( In )             | 6A、10A、16A、20A、25A、32A、40A、50A、63A                                                                                             |
| Number of poles                                        | 1P、2P、3P、4P                                                                                                                    |
| Rated service short-circuit breaking capacity (Ics)    | 6kA (2P 800V 4P1200V) 2kA                                                                                                      |
| Rated ultimate short-circuit breaking capacity (Icu )  | 6kA (2P 800V 4P1200V) 2kA                                                                                                      |
| Mechanical life                                        | 20000 times                                                                                                                    |
| Electrical life                                        | 10000 times ( ≤DC125V/1P, ≤ DC250V/2P),1500 times (other voltage specifications)                                               |
| Certificate                                            | CE, IEC, CB,TUV                                                                                                                |
| Suitable for fishbone connector wiring and wire wiring | Suitable for fishbone connector wiring and wire wiring                                                                         |
| Rated impulse withstand voltage (Uimp)                 | 6kV                                                                                                                            |
| Tripping characteristics                               | B/C                                                                                                                            |
| Release type                                           | Thermomagnetic                                                                                                                 |
| Overvoltage level                                      | III                                                                                                                            |
| Pollution degree                                       | 3                                                                                                                              |
| Protection Degrees                                     | IP40;IP20 for wiring port                                                                                                      |
| Moisture resistance                                    | Class II                                                                                                                       |
| Relative humidity                                      | ≤95%                                                                                                                           |
| Standards compliant                                    | IEC 60749-2 GB/T14048.2                                                                                                        |
| Shock resistance                                       | According to IEC60068-2-6                                                                                                      |
| Anti-mechanical shock parameters                       | According to IEC60068-2-27                                                                                                     |
| Operating ambient temperature                          | -30℃~70℃                                                                                                                       |
| Heat & humidity resistant(IEC 60068-4)                 | Db type (temperature 55℃, 6 cycles)                                                                                            |
| Storage ambient temperature                            | -40℃~85℃                                                                                                                       |
| Installation method                                    | DIN                                                                                                                            |
| Altitude                                               | ≤2000m                                                                                                                         |
| Weight                                                 | 0.12kg/P                                                                                                                       |
| Accessories                                            | OF/SD/MX/MN/MX+OF                                                                                                              |
| MX control voltage Us                                  | DC: 12V, 24V, 220V; AC: 110V, 220V, 3380V power supply recommended not less than 75W                                           |
| MN rated voltage Un                                    | AC220V                                                                                                                         |

TRIPPING CHARACTERISTICS



PRODUCT POWER CONSUMPTION

| NO. | Specification (A) | Power (W) |      |       |       | <g id="Bold">Remarks</g> |
|-----|-------------------|-----------|------|-------|-------|--------------------------|
|     |                   | 1P        | 2P   | 3P    | 4P    |                          |
| 1   | 6                 | 0.45      | 0.72 | 0.99  | 1.44  | -                        |
| 2   | 10                | 1.15      | 1.7  | 2.25  | 3.4   | -                        |
| 3   | 16                | 1.66      | 2.67 | 3.68  | 5.34  | -                        |
| 4   | 20                | 1.76      | 2.78 | 3.8   | 5.56  | -                        |
| 5   | 25                | 2.5       | 3.88 | 5.25  | 7.75  | -                        |
| 6   | 32                | 2.88      | 4.16 | 5.44  | 8.32  | -                        |
| 7   | 40                | 4.32      | 6.24 | 8.16  | 12.48 | -                        |
| 8   | 50                | 3.65      | 6.2  | 8.75  | 12.4  | -                        |
| 9   | 63                | 5.04      | 8.19 | 11.34 | 16.38 | -                        |

WIRING METHOD

