

Surge-Trap® Type 1 - 50 kA

DIN Rail IEC Type 1 / Class I

ST T1 50 is the most robust range of single pole Type 1/Class I lightning current arresters, able to discharge energy (current) from a direct lightning strike (10/350) on an external lightning protection system (LPS) or overhead supplies, in accordance with IEC 61643-1. DIN rail modular format. Suitable as a first step of protection in incoming power supply panels and in areas of high atmospheric exposure.

Features Benefits

- Easy to install and retrofit
- Visual indicator
- Remote indicator
- DIN-rail mountable
- Fully fail-safe protection, self-protected design

Applications

- Low Voltage Distribution
- AC drives
- Power supplies
- Motor controls and starter systems
- UPS systems
- Security systems
- IT/Data centers
- Medical equipment
- HVAC applications
- Power transfer equipment
- Programmable logic controller (PLC) applications
- Photovoltaic systems
- Industrial automation
- Telecommunications
- Water treatment
- Traffic lights
- LED luminaires

Technical data overview

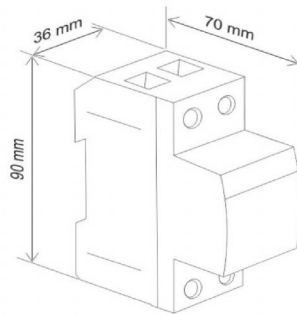
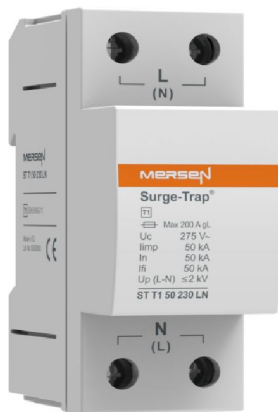
Class	Type 1 / Class I
Voltage AC	230 VAC
Icc Range	25 ... 50 kA
Iimp Range	50 ... 100 kA
Mounting	DIN-rail
Body Material	PC+GF; V-0
Materials Contact	Steel
SCCR	25 - 50 kA
Number of Poles	1



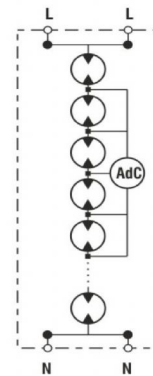
Standards

IEC 61643-1 Class I
IEC 61643-11 Type 1





Dimensions

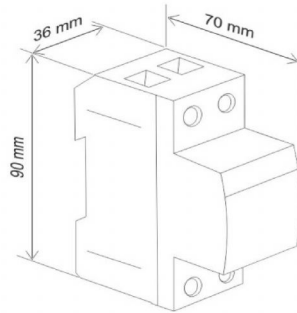


Internal configuration

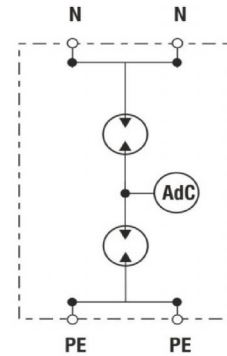
Catalog number		ST T1 50 230 LN
Designation according to EN 61643-11		Type 1
Designation according to IEC 61643-1		Class I
Nominal voltage AC 50-60 Hz (L-N)	Un (L-N) [V]	230
Maximum continuous operating voltage (L-N)	Uc (L-N) [V]	275
Lightning impulse current (10/350) (L-N)	Iimp (L-N) [kA]	50
Nominal discharge current (8/20) (L-N)	In (L-N) [kA]	50
Voltage protection level (L-N) at In	Up (L-N) [kV]	2,0
Maximum back-up fuse	A [gL]	200
Short circuit withstand	Icc [kA]	50
Response time (L-N)	tA [ns]	100
Following current (L-N)	Ifi [kA]	50
Remote indication		No
Insulating material & flammability class		PC+GF; V-0
Enclosure		IP 20

SURGE-TRAP® ST T1 100 NPE

Data Sheet



Dimensions



Internal configuration

Catalog number		ST T1 100 NPE
Designation according to EN 61643-11		Type 1
Designation according to IEC 61643-1		Class I
Nominal voltage AC 50-60 Hz (L-N)	Un (L-N) [V]	Neutral
Maximum continuous operating voltage (N-PE)	Uc (N-PE) [V]	255
Lightning impulse current (10/350) (N-PE)	Iimp (N-PE) [kA]	100
Nominal discharge current (8/20) (N-PE)	In (N-PE) [kA]	100
Voltage protection level (N-PE) at In	Up (N-PE) [kV]	2,0
Short circuit withstand	Icc [kA]	25
Response time (N-PE)	tA [ns]	100
Following current (N-PE)	Ifi [A]	100
Remote indication		No
Insulating material & flammability class		PC+GF; V-0
Enclosure		IP 20