

DIN RAIL SURGE PROTECTION CLASS I+II 25 KA, 240/415 VAC UN, TN-S, TT

CATALOG NUMBER

DT1M27531R



CERTIFICATIONS



FEATURES

- Spark gap surge performance with MOV-like current extinction
- Universally coordinated with any Class II or Class III surge protection devices
- Follow current limitation, no tripping of a 16 A gG fuse
- Compact, yet high surge rated pluggable design, using minimum DIN rail width
- Retaining clip ensures enhanced vibration and shock resistance performance
- Red/Green status indication and change-over contacts standard for remote monitoring
- Includes thermal disconnect for safe end of life

PRODUCT ATTRIBUTES

- Nominal System Voltage (Un): 220/380 - 240/415 VAC
- Nominal Discharge Current (In), IEC: 25 kA 8/20 μ s L-N;100 kA 8/20 μ s N-PE
- Max Continuous Operating Voltage (Uc): 275 VAC L-N;305 VAC N-PE
- Max Discharge Current (Imax), IEC: 65 kA 8/20 μ s L-N;150 kA 8/20 μ s N-PE
- Impulse Current (Iimp): 25 kA 10/350 μ s L-N;100 kA 10/350 μ s N-PE
- Voltage Protection Level (Up), L-N: 1,800 V
- Voltage Protection Level (Up), N-PE: 1,500 V

Short Circuit Current Rating (Iscrr): 50 kA

Frequency: 50 – 60 Hz

Back-Up Fuse @ Isccr: 315 A @ 50 kA

Response Time: 100 ns Max

Distribution System: TN-S;TT

Protection Modes: L-N;N-PE

Follow Current Interrupt Rating (Ifi): 50 kA L-N;100 A

Temporary Over Voltage 120 min (Ut/mode), L-N: 442 V Withstand

Temporary Over Voltage Withstand 200 ms (Ut), N-PE: 1,200 V

Technology: Thermal Disconnect

Connection, Stranded: 25 mm² Max

Torque: 4.50 N-m

Connection, Solid: 35 mm² Max

Altitude: 2,000 m Max

Humidity: 5 – 95 % RH

Temperature: -40 to 70 °C

Enclosure Material: UL® 94V-0 Thermoplastic

Enclosure Rating: IP 20

Mounting: 35 mm top hat DIN rail

Status Indication: Mechanical flag

Remote Contacts: Yes

Remote Contact Switching Capacity: 1.0 A @ 250 VAC;1.0 A @ 125 VAC;0.5 A @ 48 VDC;0.5 A @ 24 VDC;0.5 A @ 12 VDC

Depth: 85 mm

Height: 90 mm

Width: 72 mm

Unit Weight: 0.690 kg

Replacement Module: DT1M27531M;SGT1100M

Complies With: EN 61643-11 Type 1, Type 2;IEC® 61643-11 Class I, Class II

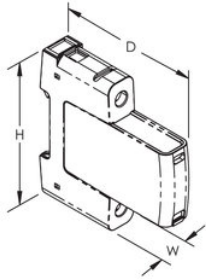
ADDITIONAL PRODUCT DETAILS

Surges and voltage transients are a major cause of expensive electronic equipment failure and business disruption. Damage may result in the loss of capital outlays, such as computers and communications equipment, as well as consequential loss of revenue and profits due to unscheduled system down-time. nVent ERICO offers multiple series of surge protective devices (SPDs) suitable for a vast range of applications that provide reliable protection from voltage transients on power distribution systems. The DT1M Series DIN Rail Surge Protective Devices provide reliable and efficient protection against voltage transients within the IEC Class I (25 kA) environment. Tested and independently certified to the IEC standard, the DT1M Series provides a range of compact, safe and high surge rated performance features for the harsh IEC Class I environment and suitable for protection within a wide range of applications.

Additionally, the nVent ERICO DT1M Series sets itself apart from the competition with an innovative and unique technology.

This technology advancement provides spark gap-like performance with MOV current extinction. The same technology allows the DT1M Series to be thinner than the competition by as much as 50% and can also be universally coordinated with any Class II or Class III SPD.

DIAGRAMS



WARNING

nVent products shall be installed and used only as indicated in nVent's product instruction sheets and training materials. Instruction sheets are available at www.nvent.com and from your nVent customer service representative. Improper installation, misuse, misapplication or other failure to completely follow nVent's instructions and warnings may cause product malfunction, property damage, serious bodily injury and death and/or void your warranty.