

Modular TDX Panel Protector, 100 kA with Surge Counter



FEATURES

Transient Discriminating (TD) Technology provides increased service life

Modular design allows easy replacement of surge modules

Built-in features include TD Technology, thermal protection and short circuit current fusing

Compact NEMA®-4 enclosure design can be flush mounted or installed in a small space

Status indication flag per mode, voltage presence LEDs, audible alarm and voltage-free contacts providing remote status monitoring

100 kA 8/20 μ s maximum surge rating provides protection suitable for main-distribution panels and an extended operational life



SPECIFICATIONS

Table 1/2

Catalog Number	TDX100S120240D	TDX100S277480T	TDX100S347600
Service Configuration	Delta		

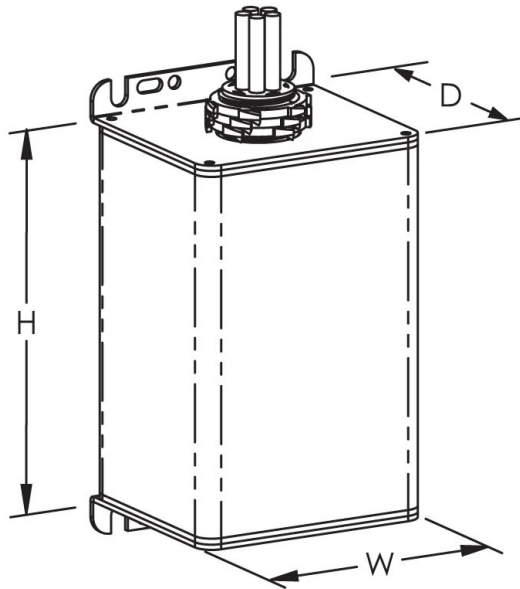
Catalog Number	TDX100S120240D	TDX100S277480T	TDX100S347600
Nominal System Voltage (Un)	120/240 V	277/480 V	347/600 V
Distribution System	3PhΔ 4W+G	3Ph 4W+G (suitable for TT system)	3Ph 4W+G
Max Continuous Operating Voltage (Uc)	170/276 VAC	320/550 VAC	550/1100 VAC
Stand-off Voltage	240/415 VAC	480/831 VAC	790/1370 VAC
Frequency	50 - 60 Hz	50 - 60 Hz	50 - 60 Hz
Short Circuit Current Rating (SCCR)	200kA	200kA	200kA
Nominal Discharge Current (In), IEC	40kA 8/20 μs	40kA 8/20 μs	40kA 8/20 μs
Nominal Discharge Current (In), UL	20kA 8/20 μs	20kA 8/20 μs	20kA 8/20 μs
Max Discharge Current (Imax), Per Phase	100kA 8/20 μs	100kA 8/20 μs	100kA 8/20 μs
Impulse Current (Iimp), Per Mode	12.5kA 10/350 μs	12.5kA 10/350 μs	12.5kA 10/350 μs
Voltage Protection Rating (VPR), L-L		25	
Voltage Protection Rating (VPR), L-N	600 V @ 3 kA 1200 V @ 20 kA	1200 V @ 3 kA 1800 V @ 20 kA	1800 V @ 3 kA 2600 V @ 20 kA
Protection Modes	L-N L-PE N-PE	L-N N-PE	L-N L-PE N-PE
Status Indication	LED Mechanical flag Audible alarm	LED Mechanical flag Audible alarm	LED Mechanical flag Audible alarm
Surge Counter	Yes	Yes	Yes
Technology	TD technology with thermal disconnect Over-current replaceable cartridge fusing EMI/RFI filter	TD technology with thermal disconnect Over-current replaceable cartridge fusing EMI/RFI filter	TD technology with thermal disconnect Over-current replaceable cartridge fusing EMI/RFI filter
Remote Contacts	Yes	Yes	Yes
Lead Length	762mm	762mm	762mm

Table 2/2

Catalog Number	TDX100S120240D	TDX100S277480T	TDX100S347600
Lead Size	5.26 mm ²	5.26 mm ²	5.26 mm ²
Ground Lead Length	914mm	914mm	914mm
Temperature	-40 to 80 °C	-40 to 80 °C	-40 to 80 °C

Catalog Number	TDX100S120240D	TDX100S277480T	TDX100S347600
Enclosure Material	Metal	Metal	Metal
Enclosure Rating	IP 65 NEMA®-4	IP 65 NEMA®-4	IP 65 NEMA®-4
Mounting	3/4" straight nipple	3/4" straight nipple	3/4" straight nipple
Depth (D)	78mm	78mm	78mm
Height (H)	240 mm	240 mm	240 mm
Width (W)	84 mm	84 mm	84 mm
Unit Weight	1.41 kg	1.41 kg	1.41 kg
Certification Details	UL® 1449 Edition 5 Type 2, 20 kA Mode	UL® 1449 Edition 5 Type 2, 20 kA Mode	UL® 1449 Edition 5 Type 2, 20 kA Mode
Complies With	ANSI®/IEEE® C62.41.2-2002 Cat A, Cat B, Cat C ANSI®/IEEE® C62.41.2-2002 Scenario II, Exposure 3, 100 kA 8/20 µs, 10 kA 10/350 µs IEC® 61643-1 Class I, Class II	ANSI®/IEEE® C62.41.2-2002 Cat A, Cat B, Cat C ANSI®/IEEE® C62.41.2-2002 Scenario II, Exposure 3, 100 kA 8/20 µs, 10 kA 10/350 µs IEC® 61643-1 Class I, Class II	ANSI®/IEEE® C62.41.2-2002 Cat A, Cat B, Cat C ANSI®/IEEE® C62.41.2-2002 Scenario II, Exposure 3, 100 kA 8/20 µs, 10 kA 10/350 µs IEC® 61643-1 Class I, Class II
Replacement Module	TDS150M150 TDS150M240	TDS150M277 SGD125M	TDS150M560

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.

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