

Type 2 surge protection plug - VAL-SEC-T2-48DC-P - 2907877

Please be informed that the data shown in this PDF Document is generated from our Online Catalog. Please find the complete data in the user's documentation. Our General Terms of Use for Downloads are valid (<http://phoenixcontact.com/download>)



Replacement plug for surge protective devices from the VALVETRAB SEC product range for DC power sources.



Key Commercial Data

Packing unit	1 pc
GTIN	
GTIN	4055626245027
Weight per Piece (excluding packing)	49.600 g
Custom tariff number	85363030
Country of origin	Germany
Note	Made to Order (non-returnable)

Technical data

Dimensions

Height	46.4 mm
Width	11.7 mm
Depth	59.4 mm
Horizontal pitch	0.6 Div.

Ambient conditions

Degree of protection	IP20
Ambient temperature (operation)	-40 °C ... 80 °C
Ambient temperature (storage/transport)	-40 °C ... 80 °C
Altitude	≤ 6000 m (amsl (above mean sea level))
Permissible humidity (operation)	5 % ... 95 %
Shock (operation)	30g (Half-sine / 11 ms / 3x ±X, ±Y, ±Z)
Vibration (operation)	5g (10 ... 500 Hz / 2.5 h / X, Y, Z)

General

Type 2 surge protection plug - VAL-SEC-T2-48DC-P - 2907877

Technical data

General

IEC test classification	II
	T2
EN type	T2
IEC power supply system	DC
Mode of protection	(DC+) - (DC-)
	(DC+/DC-) - PE
Mounting type	on base element
Color	light grey RAL 7035
Housing material	PA 6.6-FR 20 % GF
	PBT-FR
Degree of pollution	2
Flammability rating according to UL 94	V-0
Type	Male
Number of positions	1
Surge protection fault message	optical

Protective circuit

Nominal voltage U_N	48 V DC ... 60 V DC
Maximum continuous voltage U_C	75 V DC
Residual current I_{PE}	$\leq 50 \mu\text{A DC}$
Nominal discharge current I_n (8/20) μs	20 kA
Maximum discharge current I_{max} (8/20) μs	40 kA
Impulse discharge current (10/350) μs , charge	2 As
Impulse discharge current (10/350) μs , specific energy	4 kJ/ Ω
Impulse discharge current (10/350) μs , peak value I_{imp}	4 kA
Short-circuit current rating I_{SCCR}	0.2 kA (without backup fuse)
	6 kA (for 20 A gG/B backup fuse)
Voltage protection level U_p	$\leq 0.5 \text{ kV}$
Residual voltage U_{res}	$\leq 0.5 \text{ kV}$ (at I_n)
	$\leq 0.4 \text{ kV}$ (at 10 kA)
	$\leq 0.35 \text{ kV}$ (at 5 kA)
	$\leq 0.3 \text{ kV}$ (at 2 kA)
TOV behavior at U_T	87 V DC (5 s / withstand mode)
Response time t_A	$\leq 25 \text{ ns}$
Max. backup fuse with V-type through wiring	20 A (gG / B at $I_{SCCR} > 200 \text{ A}$)
Max. backup fuse with branch wiring	20 A (gG / B at $I_{SCCR} > 200 \text{ A}$)

Connection data

Connection method	pluggable
-------------------	-----------

UL specifications

SPD Type	1CA
----------	-----

Type 2 surge protection plug - VAL-SEC-T2-48DC-P - 2907877

Technical data

UL specifications

Maximum continuous operating voltage MCOV	75 V DC
Nominal voltage	48 V DC
Mode of protection	(DC+) - G
	(DC-) - G
Power distribution system	DC
Voltage protection rating VPR	400 V
Nominal discharge current I_n	20 kA
Short-circuit current rating (SCCR)	50 kA

Standards and Regulations

Standards/regulations	IEC 61643-11 2011
	EN 61643-11 2012

Environmental Product Compliance

China RoHS	Environmentally Friendly Use Period = 50 years
	For details about hazardous substances go to tab "Downloads", Category "Manufacturer's declaration"

Drawings

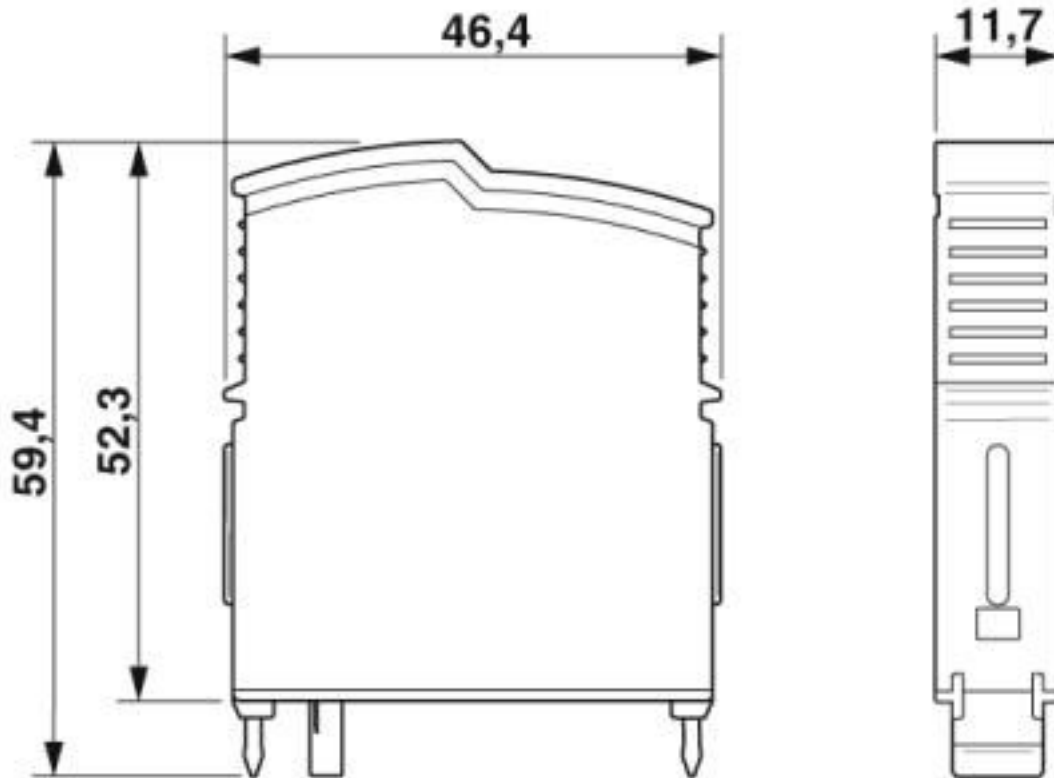
Type 2 surge protection plug - VAL-SEC-T2-48DC-P - 2907877

Circuit diagram



Type 2 surge protection plug - VAL-SEC-T2-48DC-P - 2907877

Dimensional drawing



Classifications

eCl@ss

eCl@ss 10.0.1	27130890
eCl@ss 5.1	27130801
eCl@ss 6.0	27130800
eCl@ss 7.0	27130805
eCl@ss 8.0	27130890
eCl@ss 9.0	27130890

ETIM

ETIM 5.0	EC002496
ETIM 6.0	EC000941
ETIM 7.0	EC000941

UNSPSC

UNSPSC 13.2	39121620
UNSPSC 18.0	39121620
UNSPSC 19.0	39121620
UNSPSC 20.0	39121620
UNSPSC 21.0	39121620

Type 2 surge protection plug - VAL-SEC-T2-48DC-P - 2907877

Approvals

Approvals

Approvals

EAC / UL Recognized / cUL Recognized / cULus Recognized

Ex Approvals

Approval details

EAC			RU C-DE.*09.B.00169
-----	--	--	---------------------

UL Recognized		http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm	FILE E 330181
---------------	--	---	---------------

cUL Recognized		http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm	FILE E 330181
----------------	--	---	---------------

cULus Recognized			
------------------	--	--	--

Accessories

Accessories

Device marking

Label - EML (20XE)R - 0803452



Label, Roll, white, unlabeled, can be labeled with: THERMOMARK ROLLMASTER 300/600, THERMOMARK X1.2, THERMOMARK ROLL X1, THERMOMARK ROLL 2.0, THERMOMARK ROLL, mounting type: adhesive, lettering field size: continuous x 20#mm

Type 2 surge protection plug - VAL-SEC-T2-48DC-P - 2907877

Accessories

Label - EML (20XE)R YE - 0803453



Label, Roll, yellow, unlabeled, can be labeled with: THERMOMARK ROLLMASTER 300/600, THERMOMARK X1.2, THERMOMARK ROLL X1, THERMOMARK ROLL 2.0, THERMOMARK ROLL, mounting type: adhesive, lettering field size: continuous x 20#mm

Marker pen

Marker pen - X-PEN 0,35 - 0811228



Marker pen without ink cartridge, for manual labeling of markers, labeling extremely wipe-proof, line thickness 0.35 mm