VSSC6SL LD24VAC/DC0.5A

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
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Germany

www.weidmueller.com

Overvoltage coupling along the conductor path may disturb or destroy sensitive signal inputs. It is important to provide protection in the immediate vicinity of I&C devices. Weidmüller's broad product range for the I&C sector offers products in a 2-piece, pluggable design and modular terminals for tension clamp or screw connection. These products are suitable for both binary and analogue signals. Weidmüller also offers other designs with integrated components such as gas discharge tubes or varistors. VARITECTOR stands for flexible and variable surge protection by Weidmüller, tested according to product standard IEC61643-21. The VARITECTOR series can be used in applications according to IEC 61643-22 / VDE 0845-3 for classes C1, C2, C3 and D1. The VARITECTOR SPC, SSC and MCZ OVP product families optimally combine electrical and mechanical properties. Size and easy handling play an important role. This surge protection is suited for confined spaces in industrical and process automation as well as in building automation applications.

General ordering data

Version	Surge protection for instrumentation and control, Surge protection for measurement and control, U_P(L/N-PE) 150 V
Order No.	1064350000
Type	VSSC6SL LD24VAC/DC0.5A
GTIN (EAN)	4032248829712
Qty.	10 pc(s).

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Technical data

Dimensions and weights

Depth	81 mm	Depth (inches)	3.189 inch
Height	88.5 mm	Height (inches)	3.484 inch
Width	6.2 mm	Width (inches)	0.244 inch
Net weight	41.6 g		

Temperatures

Storage temperature	-40 °C...80 °C	Operating temperature	-40 °C...70 °C
Humidity	5...96 %		

Probability of failure

SIL in compliance with IEC 61508	3	MTTF	2,114 a
SFF	96.67 %	λges	54
PFH in $1*10^{-9}$ per hour	1.8		

Rated data UL

Certificate No. (UL)	E311081	UL certificate	UL Zertifikat

CSA protection data

Gas group C	IIB	Gas group D	IIA
Gas groups A, B	IIC	Input current, max. I_I	500 mA
Input voltage, max. U_i	42 V	Internal capacity, max. C_I	2 nF
Internal inductance, max. L_I	0 µH		

General data

Colour	black	Design	Terminal
Isolating function	No	Optical function display	Yes
Protection degree	IP20	Rail	TS 35
Segment	Measurement - Monitoring - Setting	UL 94 flammability rating	V-0
Version	Surge protection for measurement and control		

Insulation coordination acc. to EN 50178

Pollution severity	2	Surge voltage category	III

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Technical data

Rated data IEC / EN

Discharge current I_{max} (8/20µs) wire-PE	10 kA	Discharge current I_n (8/20µs) wire-PE	2.5 kA
Discharge current, max. (8/20 µs)	20 kA	Fuse	0.5 A
Insertion loss	3.12 Mhz	Leakage current at U_n	2.8 mA
Lightning test current I_{imp} (10/350 µs)	1 kA	Lightning test current, I_{imp} (10/350 µs) Wire-PE	1 kA
Max. continuous voltage, Uc (AC)	30 V	Max. continuous voltage, Uc (DC)	42 V
Number of poles	1	Overload - failure mode	Modus 2
Protection level U_P (typ.)	150 V	Pulse-reset capacity	≤ 20 ms
Rated current I_N	500 mA	Rated voltage (AC)	24 V
Rated voltage (DC)	34 V	Requirements category acc. to IEC 61643-21	C2, C3, D1
Signal transmission properties (-3 dB)	3.2 MHz	Standards	IEC 61643-21
Surge current-carrying capacity C2	2.5 kA 8/20 µs	Surge current-carrying capacity C3	10 A 10/1000 µs
Surge current-carrying capacity D1	1 kA 10/350 µs	Voltage type	AC/DC
Volume resistance	1.8 Ω 10 %		

Further details of approvals

GOST certificate	GOST-Zertifikat

Connection data

Stripping length	10 mm	Type of connection	Screw connection
Tightening torque, min.	0.5 Nm	Tightening torque, max.	0.8 Nm
Clamping range, min.	0.5 mm²	Clamping range, max.	4 mm²
Wire cross-section, solid, min.	0.5 mm²	Wire cross-section, solid, max.	6 mm²
Conductor cross-section, flexible, AEH (DIN 46228-1), min.	0.5 mm²	Conductor cross-section, flexible, AEH (DIN 46228-1), max.	4 mm²
Connection cross-section, stranded, min.	0.5 mm²	Connection cross-section, stranded, max.	4 mm²

Ratings IECEx/ATEX/cUL

cUL certificate	cUL Certificate

Classifications

ETIM 6.0	EC000943	ETIM 7.0	EC000943
ETIM 8.0	EC000943	ETIM 9.0	EC000943
ECLASS 9.0	27-13-08-07	ECLASS 9.1	27-13-08-07
ECLASS 10.0	27-13-08-07	ECLASS 11.0	27-13-08-07
ECLASS 12.0	27-17-90-90	ECLASS 13.0	27-17-90-90

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Technical data

Tender specification sheets

Long specification	Surge protection in a one piece, 6.2 mm wide DIN rail module for two binary, potential-free signal circuits with 24 V UC. Signal indication via a green LED. When the terminal is fitted, a simultaneous electrically conducting contact is made between the mounting rail (earth) and the reference potential (ground) of the protection circuit in the terminal. Optical identification of the terminal based on the type of protected switching and the voltage level. The terminal can be labelled or marked.	Short specification	Surge protection in a one piece, 6.2 mm wide DIN rail module for two binary, potential-free signal circuits. Signal indication via a green LED. Version: 24V UC

Environmental Product Compliance

REACH SVHC	Lead 7439-92-1
SCIP	71e97bb7-979f-4330-94c0-20c629bb05e3

Important note

Product information	Mode 2: State where the voltage-limiting part of the SPD was short-circuited due to a very low impedance within the SPD. The line is inoperable, but the measuring equipment is still protected by means of a short-circuit.

Approvals

Approvals	
ROHS	Conform
UL File Number Search	UL Website
Certificate No. (UL)	E311081

Downloads

Approval/Certificate/Document of Conformity	SIL Paper EU_Konformitätserklärung / EU_Declaration_of_Conformity
Engineering Data	CAD data – STEP
User Documentation	Beipackzettel / Instruction sheet
Catalogues	Catalogues in PDF-format
Brochures	

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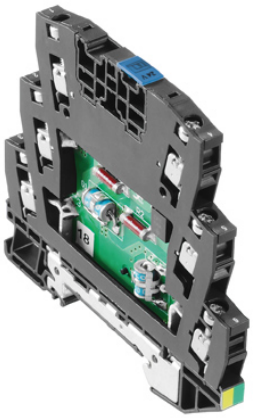
Drawings



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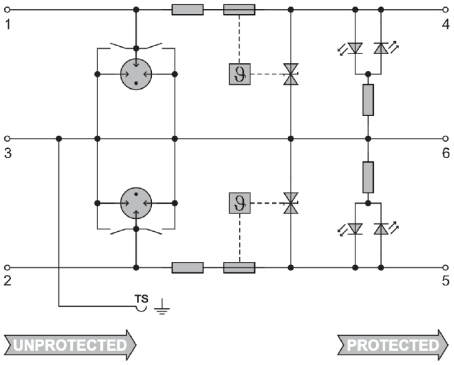

Circuit diagram

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Accessories

Blank

The Dekafix (DEK) marker is the universal marker for all conductor and plug-in connectors as well as for electronic sub-assemblies. The system is ideal for short number sequences and covers a wide range of ready-printed markers.
Strips for fast installation in only one work step. The printing is easy to read, rich in contrast and available in various widths.

- Large range of ready-to-use markers
- Strips for fast installation
- Terminal markers, suitable for all Weidmüller cable connectors
- Available as blank MultiCard or with standard printing

For custom printing: Please send us a file of our labeling software M-Print PRO or M-Print PRO Online (without installation) for your labeling specifications.

General ordering data

Type	DEK 5/5 MC NE WS	Version
Order No.	1609801044	Dekafix, Terminal marker, 5 x 5 mm, Pitch in mm (P): 5.00
GTIN (EAN)	4008190397111	Weidmueller, white
Qty.	1,000 pc(s).	

Accessories (end plates)

End plates (AP) for the VSSC product series in light blue and black

General ordering data

Type	AP VSSC6	Version
Order No.	1063110000	VSSC, End plate
GTIN (EAN)	4032248947553	
Qty.	50 pc(s).	

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Accessories

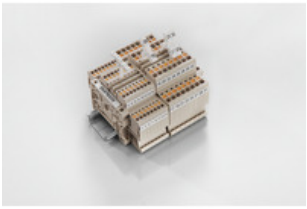
Test plugs

Test adapters and test plugs are used for the electrical connection between terminal blocks and the test equipment. In this way, an electrical contact can be established in the wired state and measurements can be done easily.

General ordering data

Type	PS 2.3 RT	Version
Order No.	0180400000	Test adapter (terminal), 230 V, 20 mA
GTIN (EAN)	4008190060121	
Qty.	20 pc(s).	

SnapMark



SnapMark - this tag carrier has been developed especifically for the I-series double-level terminal IDK 1.5N. The flexible pivot mechanism allows cross-connections to be easily installed or removed. It can hold four DEK 5 labelling tags or two WS 10/5 Middle connector markers.

General ordering data

Type	SNAPMARK I	Version
Order No.	1805880000	Group markers, Terminal marker, 23 x 5 mm, Pitch in mm (P): 5.00
GTIN (EAN)	4032248273614	Weidmueller, white
Qty.	50 pc(s).	