PHŒNIX CONTACT

Type 2 surge protection base element - VAL-MS-T1/T2 BE/O - 2905650

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Base element for type 1/2 arresters from the VALVETRAB MS T1/T2 product range. Version: 1-channel

Your advantages

☑ Plug-in direction parallel to the conductor axis

☑ Versions with and without floating remote indication contact

☑ Rack-mount 2U panel applications

☑ Accepts Type 1 and Type 2 VAL-MS plugs.

☑ Coding when protective plug is inserted for the first time

☑ DIN rail mounting

RoHS

Key Commercial Data

Packing unit	12 pc
Minimum order quantity	12 pc
GTIN	4 046356 983006
GTIN	4046356983006

Technical data

Dimensions

Height	77.1 mm
Width	17.6 mm
Depth	89.2 mm

Ambient conditions

Degree of protection	IP20
	IP20
Ambient temperature (operation)	-40 °C ... 80 °C
Altitude	max. 2000 m
Permissible humidity (operation)	5 % ... 95 %

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Technical data

Ambient conditions

Shock (operation)	25g
Vibration (operation)	5g

General

IEC test classification	I / II
	T1 / T2
EN type	T1 / T2
Mounting type	DIN rail: 35 mm
Color	black
Housing material	PBT
Degree of pollution	2
Flammability rating according to UL 94	V0
Type	Base element, DIN rail mounting
Number of positions	1
Surge protection fault message	none

Additional descriptions

Note	For installation into a touch protected cabinet. For applications with U_C > 500 V distances at the side and distances at the connection area must be minimum of 5 mm between different active parts including earthed parts.

Protective circuit

Nominal frequency f_N	50 Hz (60 Hz)
Maximum continuous voltage U_C	600 V AC
Rated load current I_L	80 A (with serial 16mm² through wiring)
	80 A (with serial 16mm² through wiring)
Short-circuit current rating I_{SCCR}	25 kA
Max. backup fuse with V-type through wiring	80 A AC (gL/gG)
Max. backup fuse with branch wiring	160 A (gL/gG)

Connection data

Connection method	Biconnect terminal blocks
Screw thread	M5
Tightening torque	30 lb$_F$-in. (UL)
Stripping length	16 mm
Conductor cross section flexible min.	1.5 mm²
Conductor cross section flexible max.	25 mm²
Conductor cross section solid min.	1.5 mm²
Conductor cross section solid max.	35 mm²
Conductor cross section AWG	15 ... 2 (IEC)
	10 ... 2 (UL)

UL specifications

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Technical data

UL specifications

SPD Type	4 (for Type 2 applications)

Standards and Regulations

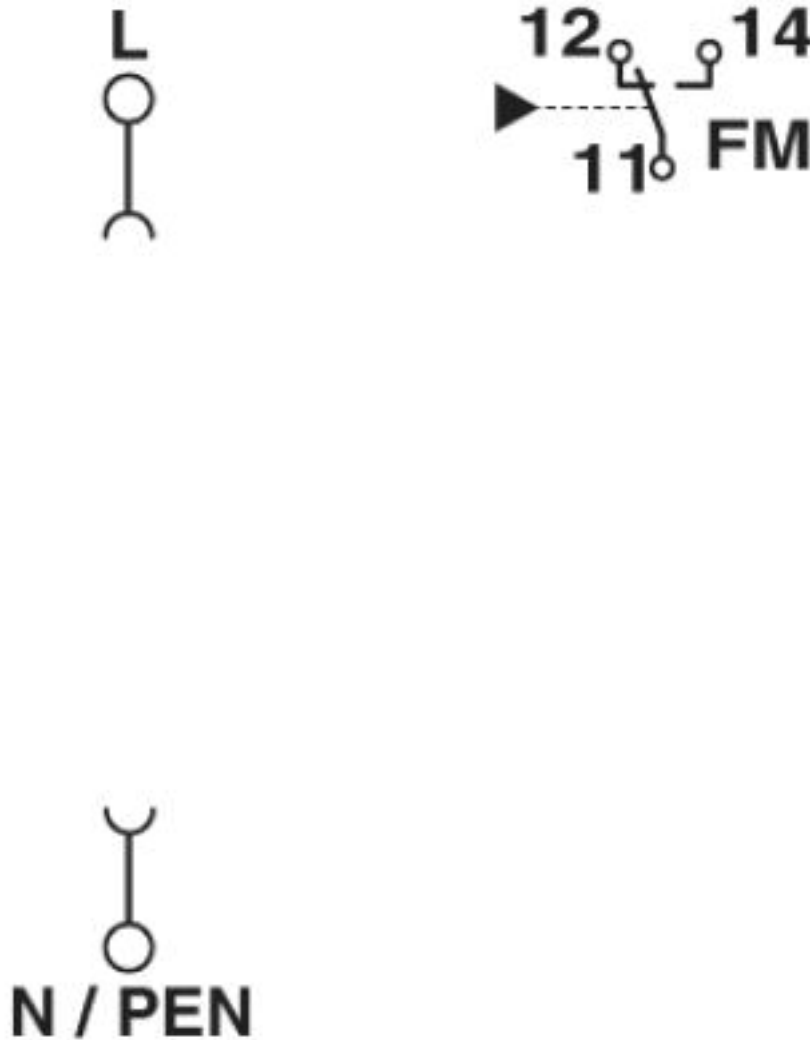| Standards/regulations	IEC 61643-1 2005
	EN 61643-11/A11 2007

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

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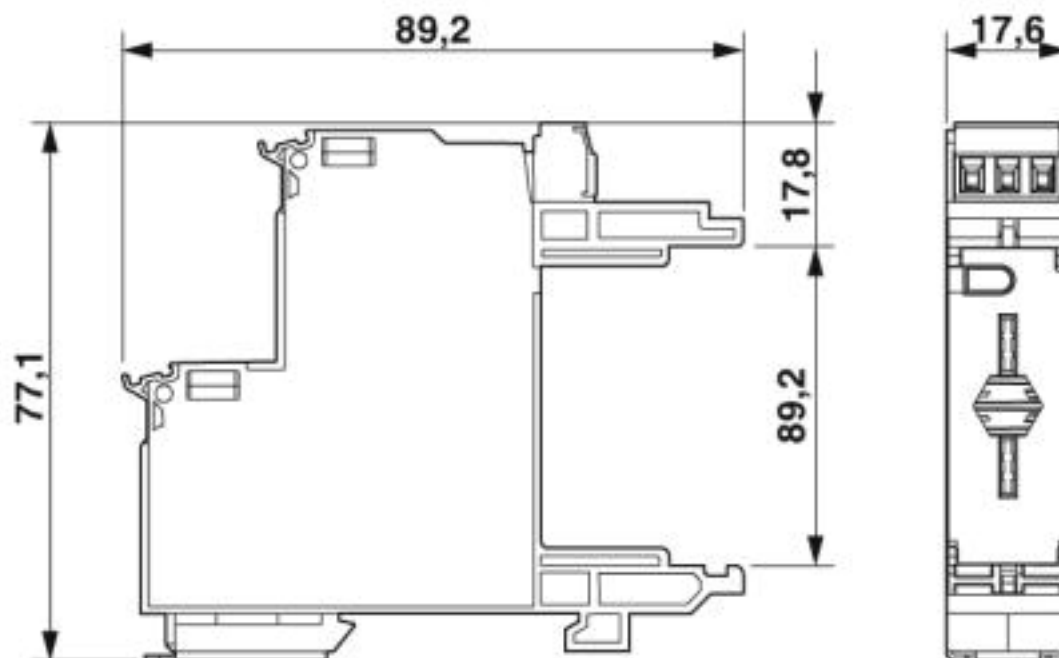
Circuit diagram

L

12 14

11 FM

N / PEN

FM version shown

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Dimensional drawing

FM version shown

Classifications

eCl@ss

eCl@ss 10.0.1	27130803
eCl@ss 4.0	27130800
eCl@ss 4.1	27130800
eCl@ss 5.0	27130800
eCl@ss 5.1	27130800
eCl@ss 6.0	27130800
eCl@ss 7.0	27130803
eCl@ss 8.0	27130803
eCl@ss 9.0	27130803

ETIM

ETIM 5.0	EC000472
ETIM 6.0	EC000472
ETIM 7.0	EC000472

UNSPSC

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

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Classifications

UNSPSC

UNSPSC 21.0	39121620

Approvals

Approvals

Approvals

UL Recognized / cUL Recognized / cULus Recognized

Ex Approvals

Approval details

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

Bridge

Wiring bridge - MPB 18/1- 2 - 2809209

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 2-pos.

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Accessories

Wiring bridge - MPB 18/1- 3 - 2809212

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 3-pos.

Wiring bridge - MPB 18/1- 4 - 2809225

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 4-pos.

Wiring bridge - MPB 18/1- 6 - 2748564

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 6-pos.

Wiring bridge - MPB 18/1- 7 BU - 2856278

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 7-pos., color: Blue

Wiring bridge - MPB 18/1- 8 BU - 2858470

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 8-pos., color: Blue

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Accessories

Wiring bridge - MPB 18/1- 8 - 2748577

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 8-pos.

Wiring bridge - MPB 18/1- 9 - 2748580

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 9-pos.

Wiring bridge - MPB 18/1-12 - 2748593

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 12-pos.

Wiring bridge - MPB 18/1-57 - 2809238

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 57-pos.

Wiring bridge - MPB 18/3- 6 - 2809241

Wiring bridge for modules with connecting pitch 17.5 mm, 3-phase, 6-pos.

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Accessories

Wiring bridge - MPB 18/3- 9 - 2809254

Wiring bridge for modules with connecting pitch 17.5 mm, 3-phase, 9-pos.

Wiring bridge - MPB 18/4- 8 - 2809283

Wiring bridge for modules with connecting pitch 17.5 mm, 4-phase, 8-pos.

Wiring bridge - MPB 18/4-12 - 2809296

Wiring bridge for modules with connecting pitch 17.5 mm, 4-phase, 12-pos.

Wiring bridge - MPB F200X16/ 1GS - 2818339

Wiring bridge flexible, diameter 16 mm², with a fork-type cable lug on one side, length: 200 mm

Wiring bridge - MPB F400X16/ 1GS - 2818342

Wiring bridge flexible, diameter 16 mm², with a fork-type cable lug on one side, length: 400 mm

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Accessories

Wiring bridge - MPB F600X16/ 1GS - 2818355

Wiring bridge flexible, diameter: 16 mm², with a fork-type cable lug on one side, length: 600 mm

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Wiring bridge - MPB F600X16/ 1GS - 2818355

Wiring bridge flexible, diameter: 16 mm², with a fork-type cable lug on one side, length: 600 mm

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Wiring bridge - MPB F400X16/ 1GS - 2818342

Wiring bridge flexible, diameter 16 mm², with a fork-type cable lug on one side, length: 400 mm

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Wiring bridge - MPB F200X16/ 1GS - 2818339

Wiring bridge flexible, diameter 16 mm², with a fork-type cable lug on one side, length: 200 mm

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Wiring bridge - MPB 18/1-10/1.0.0 - 2830443

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 10 pitches with contact sequence 1-0-0

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Accessories

Wiring bridge - MPB 18/1-20/1.2.5 - 2830168

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 20 pitches with contact sequence 1-2-0-0-5

Wiring bridge - MPB 18/4-12 - 2809296

Wiring bridge for modules with connecting pitch 17.5 mm, 4-phase, 12-pos.

Wiring bridge - MPB 18/4- 8 - 2809283

Wiring bridge for modules with connecting pitch 17.5 mm, 4-phase, 8-pos.

Wiring bridge - MPB 18/3- 6 - 2809241

Wiring bridge for modules with connecting pitch 17.5 mm, 3-phase, 6-pos.

Wiring bridge - MPB 18/1-57 - 2809238

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 57-pos.

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Accessories

Wiring bridge - MPB 18/1-12 - 2748593

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 12-pos.

Wiring bridge - MPB 18/1- 9 - 2748580

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 9-pos.

Wiring bridge - MPB 18/1- 8 - 2748577

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 8-pos.

Wiring bridge - MPB 18/1- 6 - 2748564

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 6-pos.

Wiring bridge - MPB 18/1- 4 - 2809225

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 4-pos.

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Accessories

Wiring bridge - MPB 18/1- 3 - 2809212

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 3-pos.

Wiring bridge - MPB 18/1- 2 - 2809209

Wiring bridge for modules with connecting pitch 17.5 mm, 1-phase, 2-pos.

Device marking

Zack marker strip - ZBN 18:UNBEDRUCKT - 2809128

Zack marker strip, Strip, white, unlabeled, can be labeled with: CMS-P1-PLOTTER, PLOTMARK, mounting type: snap into tall marker groove, for terminal block width: 18 mm, lettering field size: 18 x 5 mm, Number of individual labels: 5

Feed-through terminal block

Feed-through terminal block - DK-BIC-35 - 2749880

Feed-through terminal block for VAL and FLT applications

Labeled device marker

Marker for terminal blocks - ZBN 18,LGS:ERDE - 2749589

Marker for terminal blocks, Strip, white, labeled, Horizontal: Grounding symbol, mounting type: snap into tall marker groove, for terminal block width: 18 mm, lettering field size: 18 x 5 mm, Number of individual labels: 5

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Accessories

Marker for terminal blocks - ZBN 18,LGS:L1-N,ERDE - 2749576

Marker for terminal blocks, Strip, white, labeled, Horizontal: L1, L2, L3, N, GND, mounting type: snap into tall marker groove, for terminal block width: 18 mm, lettering field size: 18 x 5 mm, Number of individual labels: 5

Marker pen

Marker pen - B-STIFT - 1051993

Marker pen, for manual labeling of unprinted Zack strips, smear-proof and waterproof, line thickness 0.5 mm

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