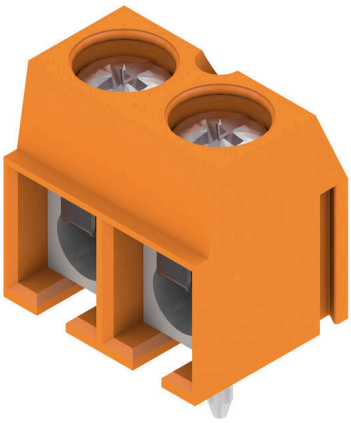
Data sheet

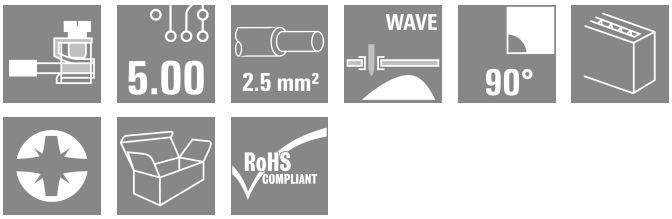
PM 5.00/02/90 3.5SN OR BX

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
D-32758 Detmold
Germany

www.weidmueller.com

Product image





PCB terminal with leaf spring connection at 5.00 and 5.08 mm pitch. Conductor outlet direction 90°. Suitable for conductor cross-sections up to 2.5 mm².

General ordering data

Version	Printed circuit board terminals, 5.00 mm, Number of poles: 2, 90°, Solder pin length (l): 3.5 mm, tinned, orange, Pressure clamp connection, Clamping range, max. : 2.5 mm², Box
Order No.	1791610000
Type	PM 5.00/02/90 3.5SN OR BX
GTIN (EAN)	4032248222605
Qty.	500 items
Product data	IEC: 600 V / 24 A / 0.13 - 2.5 mm² UL: 300 V / 15 A / AWG 26 - AWG 14
Packaging	Box

Downloaded from Arrow.com.

Data sheet

PM 5.00/02/90 3.5SN OR BX

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
D-32758 Detmold
Germany

www.weidmueller.com

Technical data

Approvals

Approvals	
ROHS	Conform
UL File Number Search	UL Website
Certificate No. (cURus)	E60693

Dimensions and weights

Depth	8 mm	Depth (inches)	0.315 inch
Height	13.5 mm	Height (inches)	0.5315 inch
Height of lowest version	10 mm	Width	10.6 mm
Width (inches)	0.4173 inch	Net weight	1.64 g

Environmental Product Compliance

RoHS Compliance Status	Compliant with exemption
RoHS Exemption (if applicable/known)	6c
REACH SVHC	Lead 7439-92-1
SCIP	c2abd024-c370-41bc-90fc-5ba34b090103

System parameters

Product family	OMNIMATE Signal - series PM	Wire connection method	Pressure clamp connection
Mounting onto the PCB	THT solder connection	Conductor outlet direction	90°
Pitch in mm (P)	5.00 mm	Pitch in inches (P)	0.197 "
Number of poles	2	Pin series quantity	1
Fitted by customer	Yes	Number of rows	1
Max. adjacent poles per row	24	Solder pin length (l)	3.5 mm
Solder pin dimensions	d = 1.0 mm	Solder eyelet hole diameter (D)	1.3 mm
Solder eyelet hole diameter tolerance (D)	+ 0,1 mm	Number of solder pins per pole	1
Screwdriver blade	0.6 x 3.5	Screwdriver blade standard	DIN 5264
Tightening torque, min.	0.4 Nm	Tightening torque, max.	0.5 Nm
Clamping screw	M 2.5	Stripping length	6 mm
L1 in mm	5.00 mm	L1 in inches	0.197 "
Touch-safe protection acc. to DIN VDE 0470	IP 20, above the PCB; with conductor connected	Touch-safe protection acc. to DIN VDE 57 106	Safe from finger touch
Protection degree	IP20		

Material data

Insulating material	Wemid (PA)	Colour	orange
Colour chart (similar)	RAL 2000	Insulating material group	I
Comparative Tracking Index (CTI)	≥ 600	Moisture Level (MSL)	
UL 94 flammability rating	V-0	Contact material	Cu-alloy
Contact surface	tinned	Coating	1-3 µm Ni, 4-6 µm SN
Tinning type	matt	Layer structure of solder connection	1.5...3.5 µm Ni / 4...6 µm Sn matt
Storage temperature, min.	-40 °C	Storage temperature, max.	70 °C
Operating temperature, min.	-50 °C	Operating temperature, max.	120 °C
Temperature range, installation, min.	-25 °C	Temperature range, installation, max.	120 °C

Downloaded from Arrow.com.

PM 5.00/02/90 3.5SN OR BX

Weidmüller

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
D-32758 Detmold
Germany

www.weidmueller.com

Technical data

Conductors suitable for connection

Clamping range, min.	0.13 mm²			
Clamping range, max.	2.5 mm²			
Wire connection cross section AWG, min.	AWG 26			
Wire connection cross section AWG, max.	AWG 14			
Solid, min. H05(07) V-U	0.13 mm²			
Solid, max. H05(07) V-U	2.5 mm²			
Flexible, min. H05(07) V-K	0.13 mm²			
Flexible, max. H05(07) V-K	2.5 mm²			
w. plastic collar ferrule, DIN 46228 pt 4, min.	0.25 mm²			
w. plastic collar ferrule, DIN 46228 pt 4, max.	1.5 mm²			
w. wire end ferrule, DIN 46228 pt 1, min.	0.25 mm²			
w. wire end ferrule, DIN 46228 pt 1, max.	1.5 mm²			
Clampable conductor	Cross-section for conductor connection	Type	fine-wired	
		nominal	0.5 mm²	
	wire end ferrule	Stripping length	nominal	8 mm
		Recommended wire-end ferrule	H0,5/12 OR	
		Stripping length	nominal	6 mm
		Recommended wire-end ferrule	H0,5/6	
	Cross-section for conductor connection	Type	fine-wired	
		nominal	0.75 mm²	
	wire end ferrule	Stripping length	nominal	8 mm
		Recommended wire-end ferrule	H0,75/12 W	
		Stripping length	nominal	6 mm
		Recommended wire-end ferrule	H0,75/6	
	Cross-section for conductor connection	Type	fine-wired	
		nominal	1 mm²	
	wire end ferrule	Stripping length	nominal	8 mm
		Recommended wire-end ferrule	H1,0/12 GE	
		Stripping length	nominal	6 mm
		Recommended wire-end ferrule	H1,0/6	
	Cross-section for conductor connection	Type	fine-wired	
		nominal	0.25 mm²	
	wire end ferrule	Stripping length	nominal	8 mm
		Recommended wire-end ferrule	H0,25/10 HBL	
		Stripping length	nominal	5 mm
		Recommended wire-end ferrule	H0,25/5	
	Cross-section for conductor connection	Type	fine-wired	
		nominal	0.34 mm²	
	wire end ferrule	Stripping length	nominal	8 mm
		Recommended wire-end ferrule	H0,34/10 TK	
Reference text	Length of ferrules is to be chosen depending on the product and the rated voltage., The outside diameter of the plastic collar should not be larger than the pitch (P)			

Downloaded from Arrow.com.

PM 5.00/02/90 3.5SN OR BX

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
D-32758 Detmold
Germany

www.weidmueller.com

Technical data

Rated data acc. to IEC

tested acc. to standard	IEC 60664-1, IEC 61984	Rated current at min. number of poles (Tu = 20 °C)	24 A
Rated current, max. number of poles (Tu=20°C)	24 A	Rated current, min. number of poles (Tu=40°C)	24 A
Rated current at max. number of poles (Tu = 40 °C)	24 A	Rated voltage for surge voltage class (pollution degree II/2)	600 V
Rated voltage for surge voltage class (pollution degree III/2)	250 V	Rated voltage for surge voltage class (pollution degree III/3)	250 V
Rated impulse voltage for surge voltage class (pollution degree II/2)	4 kV	Rated impulse voltage for surge voltage class (pollution degree III/2)	4 kV
Rated impulse voltage for surge voltage class (contamination degree III/3)	4 kV	Short-time withstand current resistance	3 x 1s with 120 A

Rated data acc. to CSA

Institute (CSA)	CSA	Certificate No. (CSA)	200039-1815154
Rated voltage (Use group B / CSA)	300 V	Rated voltage (Use group D / CSA)	300 V
Rated current (Use group B / CSA)	15 A	Rated current (Use group D / CSA)	10 A
Wire cross-section, AWG, min.	AWG 26	Wire cross-section, AWG, max.	AWG 14
Reference to approval values	Specifications are maximum values, details - see approval certificate.		

Rated data acc. to UL 1059

Institute (cURus)	CURUS	Certificate No. (cURus)	E60693
Rated voltage (Use group B / UL 1059)	300 V	Rated voltage (Use group D / UL 1059)	300 V
Rated current (Use group B / UL 1059)	15 A	Rated current (Use group D / UL 1059)	10 A
Wire cross-section, AWG, min.	AWG 26	Wire cross-section, AWG, max.	AWG 14
Reference to approval values	Specifications are maximum values, details - see approval certificate.		

Packing

Packaging	Box	VPE length	236.00 mm
VPE width	137.00 mm	VPE height	49.00 mm

Type tests

Test: Durability of markings	Test	mark of origin, type identification, pitch, type of material, approval marking UL, approval marking CSA, durability	
	Evaluation	available	
Test: Clampable cross section	Standard	DIN EN 60999-1 section 7 and 9.1 / 12.00, DIN EN 60947-1 section 8.2.4.5.1 / 12.02	
	Conductor type	Type of conductor and conductor cross-section	solid 0.14 mm²
		Type of conductor and conductor cross-section	stranded 0.14 mm²
		Type of conductor and conductor cross-section	solid 2.5 mm²
		Type of conductor and conductor cross-section	stranded 2.5 mm²

Downloaded from Arrow.com.

Weidmüller

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
D-32758 Detmold
Germany

www.weidmueller.com

Technical data

		Type of conductor and conductor cross-section	AWG 26/1
		Type of conductor and conductor cross-section	AWG 26/19
		Type of conductor and conductor cross-section	AWG 14/1
		Type of conductor and conductor cross-section	AWG 14/19
	Evaluation	passed	
Test for damage to and accidental loosening of conductors	Standard	DIN EN 60999-1 section 9.4 / 12.00	
	Requirement	0.2 kg	
	Conductor type	Type of conductor and conductor cross-section	stranded 0.25 mm²
		Type of conductor and conductor cross-section	AWG 26/1
		Type of conductor and conductor cross-section	AWG 26/19
	Evaluation	passed	
	Requirement	0.3 kg	
	Conductor type	Type of conductor and conductor cross-section	solid 0.5 mm²
	Evaluation	passed	
	Requirement	0.7 kg	
	Conductor type	Type of conductor and conductor cross-section	solid 2.5 mm²
		Type of conductor and conductor cross-section	stranded 2.5 mm²
		Type of conductor and conductor cross-section	AWG 14/1
		Type of conductor and conductor cross-section	AWG 14/19
	Evaluation	passed	
Pull-out test	Standard	DIN EN 60999-1 section 9.5 / 12.00	
	Requirement	≥10 N	
	Conductor type	Type of conductor and conductor cross-section	stranded 0.25 mm²
		Type of conductor and conductor cross-section	AWG 26/1
		Type of conductor and conductor cross-section	AWG 26/19
	Evaluation	passed	
	Requirement	≥20 N	
	Conductor type	Type of conductor and conductor cross-section	H05V-K0.5
	Evaluation	passed	
	Requirement	≥50 N	

Downloaded from Arrow.com.

PM 5.00/02/90 3.5SN OR BX

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
D-32758 Detmold
Germany

www.weidmueller.com

Technical data

	Conductor type	Type of conductor and conductor cross-section	H07V-U2.5
		Type of conductor and conductor cross-section	H07V-K2.5
		Type of conductor and conductor cross-section	AWG 14/1
		Type of conductor and conductor cross-section	AWG 14/19
	Evaluation	passed	

Important note

IPC conformity	Conformity: The products are developed, manufactured and delivered according international recognized standards and norms and comply with the assured properties in the data sheet resp. fulfill decorative properties in accordance with IPC-A-610 "Class 2". Further claims on the products can be evaluated on request.
Notes	• Rated current related to rated cross-section & min. No. of poles. • Wire end ferrule without plastic collar to DIN 46228/1 • Wire end ferrule with plastic collar to DIN 46228/4 • The data given under CSA relates to a cUL approval - E60693 • P on drawing = pitch • Rated data refer only to the component itself. Clearance and creepage distances to other components are to be designed in accordance with the relevant application standards. • Long term storage of the product with average temperature of 50 °C and maximum humidity 70%, 36 months

Classifications

ETIM 8.0	EC002643	ETIM 9.0	EC002643
ETIM 10.0	EC002643	ECLASS 14.0	27-46-01-01
ECLASS 15.0	27-46-01-01		

Downloaded from Arrow.com.

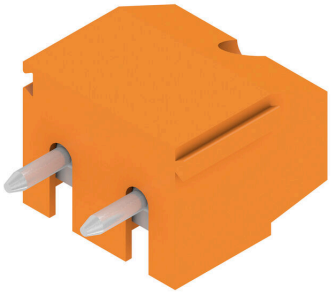
PM 5.00/02/90 3.5SN OR BX

Weidmüller Interface GmbH & Co. KG
Klingenbergstraße 26
D-32758 Detmold
Germany

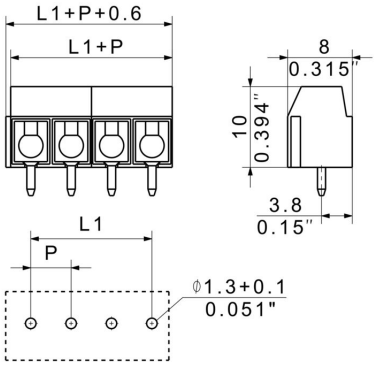
www.weidmueller.com

Drawings

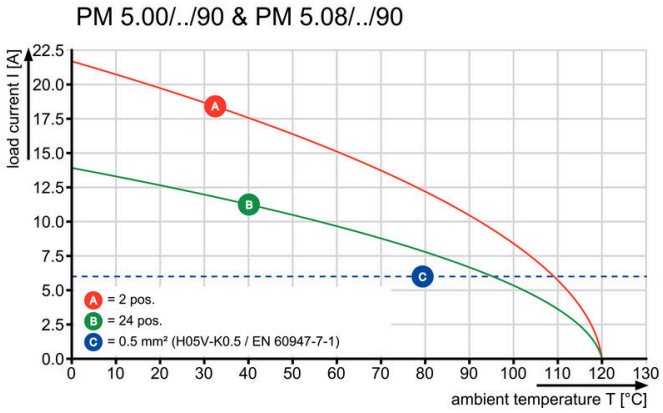
Product image



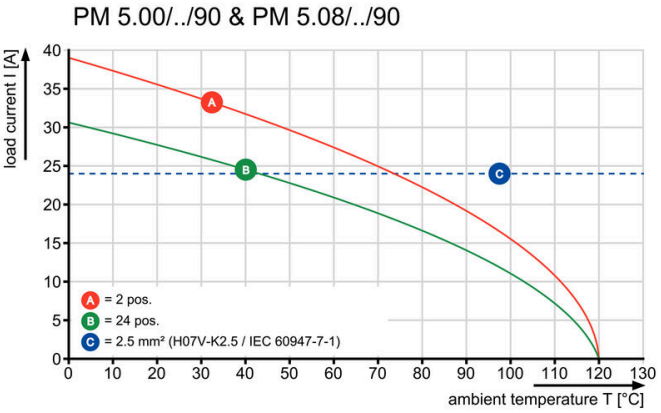
Dimensional drawing



Graph



Graph



Downloaded from Arrow.com.